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ESSAYS AND NOTICES



ESSAYS AND NOTICES

PHILOSOPHICAL
AND PSYCHOLOGICAL

BY

THOMAS WHITTAKER B.A. (OXON)

LONDON

T. FISHER UNWIN
PATERNOSTER SQUARE

1895



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PREFACE

THE contents of this volume, with the exception of the first essay, which was published separately in 1893, are all reprinted from the pages of periodicals. In three or four of the essays there has been a little re-writing, but on the whole the amount of alteration is not great. For permission to republish the articles and reviews, I have to thank Messrs. Macmillan and Co., and the editors and proprietors of *Mind* and of *The Monist*. I must also specially thank M. Renouvier for the permission, at once accorded, to reproduce his own as well as my share of a correspondence which appeared in the *Critique Philosophique* in 1887.

The common motive of both essays and reviews, as it seems to me, is an effort to arrive at something positive through criticism. Of the success with which this has been attempted, I leave the reader to judge. There is only one part of the book on which I propose to say anything more by way of preface, namely, the part which is distinctively metaphysical. So far as this is concerned, I freely admit that I have not attained any result capable of being summed up in a completed formula. Even here, however, it seems to me that something can be said with certainty, and something with a high degree of intellectual assurance.

First, as to the certainty attainable in metaphysics. The only absolute certainty seems to me to be, not in anything that can be called Ontology, but only in what is called Theory of Knowledge. All that is demonstrable in metaphysics is Idealism in the strict philosophical sense. That is to say, the external world, not only as it offers itself to ordinary apprehension, but

also as understood by science, consists of nothing but phenomena. And phenomenon is to be understood literally, in the sense of that which appears. Some science has even less truth than is implied in this; for it has only the truth of a convenient formula, useful to work out results, but in the stages of its working out corresponding only to fictions. Scientific men undoubtedly claim for some of their theories a fuller truth than that of a delicate intellectual instrument for getting at total results; but, even when scientific truth is at its greatest, it amounts only to a law of phenomena, that is, of actual or possible perceptions. When a physicist or a chemist, for example, asserts the existence of atoms, the meaning is that our perceptions, if immensely magnified, would appear as actually discontinuous in certain definable ways. But perception and its elements are wholly of mental nature. It is as elements, actual or possible, of a consciousness, that they have reality.

Can any theory be attained of this mental reality as a whole, or must we be satisfied with the assertion that the universe as understood by science is not metaphysically real, and that a true metaphysical theory, if such there were, would be in terms of mind? Another step, as it seems to me, can be taken by the aid of a postulate, though no one can be compelled to take it. In pure formal logic, it is thinkable that portions of mental reality simply come into and go out of existence. But to suppose this of the reality, though it is formally thinkable, does not promise congruity with the most precise knowledge attained of phenomena. To try to think thus in metaphysics would be entirely to desert the path that has been found to lead to truth in science. For the best established truths of science are propositions that assert constancy beneath change. The quantities that remain scientifically constant are indeed quantities that have a purely phenomenal value. Atoms and energy, considered philosophically, are names for actual or possible perceptions and relations among perceptions. But, by postulating the absolute permanence of these phenomenal values—whatever they may mean for metaphysics—coherent scientific doctrines have been reached of which the calculated

results are exactly verified, and by which the inner processes of nature are rendered physically intelligible. Since this is the path that has led to the deepest truth in the explanation of phenomena, does not a similar path seem most hopeful in the explanation of reality? In ontology, indeed, we cannot look for such precision as has been attained by chemists and physicists in their assertions of the indestructibility of matter and the conservation of energy. We must be content to postulate about the reality as idealism conceives it, what was postulated long before the days of modern science about all reality, whether conceived as physical or as metaphysical. Nothing which really is, we must say, either begins to exist absolutely or ceases to exist. Reality neither comes from nothing nor returns to nothing. And we know part of the reality in consciousness.

Thus one step is taken towards an Ontology, as distinguished from a mere Theory of Knowledge. And the possibility can be shown of taking further steps. We may go on to propositions about universal being or about individual beings, affirming one or other as the primary reality. That is, we may take the direction either of Spinoza or of Leibniz. For either direction still remains possible after all that scepticism and criticism have done. What has been proved against either type of thinking is merely this: that it cannot be deduced as a system from self-evident axioms. With revision in view of modern criticism, it still seems possible to make theoretically consistent either a doctrine proceeding from the assertion of permanent individual beings, of mental nature, which we may call monads, or a doctrine proceeding from the assertion of a permanent universal being, which we may call *intellectus infinitus*. The difficulty is that there does not seem to be any means of reducing the many theoretical possibilities to one. More than one type of metaphysical thinking, so far as can yet be seen, might be made consistent with itself and with facts. We may place our hope either in conciliating apparent opposites or in eliminating alternatives till the true one is approached. In either case our immediate aim must be greater precision both of philosophic and of scientific thought.

A doctrine that seems at first consistent, and does not obviously contradict experience, may yet, when brought to more precise expression and confronted with more exact knowledge, disappear of itself. Because this is necessarily a gradual process, and may not in the end give us more than an imperfectly determined belief, it does not therefore follow that we ought to abandon the pursuit of philosophic truth and content ourselves with science and its applications to practice, even when science is conceived in its widest sense.

If science is the theoretic explanation of phenomena as such, it seems to require as its complement a theory of reality, that is, a metaphysic. On behalf of Metaphysic as thus understood, I have desired to put in a plea against the puritans of Agnosticism. There may be no means of demonstrating that a particular metaphysical theory is true, and yet we may have a perfect right to speculate. Till we are quite sure that we have no such right, we ought to resist all attempts, whether in the interests of a positive or of a negative creed, to fetter the speculative impulse which is inherent in the higher races of mankind.

CONTENTS

ESSAYS.

	PAGE
A CRITICAL ESSAY IN THE PHILOSOPHY OF HISTORY ...	1
"MIND-STUFF" FROM THE HISTORICAL POINT OF VIEW ...	43
<i>(Mind, October, 1881.)</i>	
GIORDANO BRUNO ...	61
<i>(Mind, April, 1884.)</i>	
THE MUSICAL AND THE PICTURESQUE ELEMENTS IN POETRY ...	95
<i>(Macmillan's Magazine, April, 1886.)</i>	
INDIVIDUALISM AND STATE-ACTION ...	111
<i>(Mind, January, 1888.)</i>	
VOLKMANN'S PSYCHOLOGY ...	124
<i>(Mind, July, October, 1890.)</i>	
POLITICS AND INDUSTRY ...	173
<i>(Macmillan's Magazine, January, 1892.)</i>	
ON THE NATURE OF THOUGHT ...	179
<i>(The Monist, October, 1894.)</i>	
THE THEORY OF JUSTICE ...	186
<i>(Mind, January, 1895.)</i>	

NOTICES.

	PAGE
ANIMAL INTELLIGENCE (<i>Nature</i> , September 7, 1882.)	191
ÆSTHETICS (<i>Mind</i> , January, 1886.)	199
ON THE ETHICS OF NATURALISM (<i>Mind</i> , April, 1886.)	211
THE PHILOSOPHY OF REDEMPTION (<i>Mind</i> , July, 1886.)	218
PHILOSOPHICAL ANTINOMIES (<i>Mind</i> , January, 1887.)	228
GIORDANO BRUNO AND HIS TIME (<i>Mind</i> , July, 1887.)	249
DEAD MATTER AND LIVING MATTER (<i>Mind</i> , October, 1887.)	267
ON FREE-WILL (<i>Mind</i> , January, 1888.)	274
IDEALISM IN ENGLAND IN THE EIGHTEENTH CENTURY... (<i>Mind</i> , October, 1888.)	287
PHYSICAL REALISM (<i>Mind</i> , April, 1889.)	291
REALITY AS PHENOMENON (<i>Mind</i> , July, 1889.)	298
THOUGHT AND LIFE (<i>Mind</i> , April, 1890.)	303
THE LAWS OF IMITATION (<i>Mind</i> , July, 1890.)	309

CONTENTS

xi
PAGE

THE PROBLEM OF CAUSALITY	...	...	...	320
(Mind, January, 1891.)				

THE PHILOSOPHICAL BASIS OF EVOLUTION	...	...	...	336
(Mind, April, 1891.)				

APPENDIX.

I. CORRESPONDENCE	...	...	...	...	343
(La Critique Philosophique, 1887.)					

II. THE PSYCHOLOGY OF STIMULANTS	...	...	...	...	361
(The University Magazine, April, 1880.)					

A CRITICAL ESSAY
IN THE
PHILOSOPHY OF HISTORY.

O genus infelix humanum, talia divis
Cum tribuit facta atque iras adiunxit acerbis !
Quantos tum gemitus ipsi sibi, quantaque nobis
Volnera, quas lacrimas peperere minoribu' nostris !

Lucretius, v. 1194-7.

And of these twain, the black seed and the white,
All things come forth, endured of men and done;
And still the day is great with child of night,
And still the black night labours with the sun.

SWINBURNE, *Genesis*.

CHAPTER	PAGE
I. PROGRESS OR CYCLE ? 	3
II. ANTICIPATORY SOLUTION 	8
III. CAUSES OF THE TWO GREAT TRANSITIONS	19
IV. RESULT	38

A CRITICAL ESSAY IN THE PHILOSOPHY OF HISTORY.

CHAPTER I.

PROGRESS OR CYCLE ?

TO ask whether European history is a progress or a cycle will seem to many the re-opening of a question long since settled. By those who hold that there is, at least in possibility, a philosophy of history, it is generally supposed that the aim of this philosophy is to discover a law of progress. In spite of the supposition, no law of progress that has yet been formulated is generally received. And there is, on the surface of history, an enormous obstacle to the view that the historical series of events is a continuously progressive series. Whatever formula we adopt, how are we to bring within it at once pre-Christian antiquity, the Middle Ages, and modern times? While to one type of mind the system that governed mediæval life may seem a "Kingdom of Darkness," to another no doubt it presents itself as a "*Civitas Dei*;" but from the second point of view, as much as from the first, it would appear natural to suppose a kind of circular movement in human affairs. At the opening of the modern period, and for some time afterwards, this was the supposition generally made by those who were most disposed to regard history as an object of philosophy or science. Europe, they held, had been civilised in classical antiquity. By a catastrophe, civilisation was destroyed. Then, after a long interval, and in consequence of the re-discovery of ancient literature and institutions, it had been restored. Since about the beginning of the present century, this view has been more

and more displaced by the notion of a continuously progressive historical development. The Middle Age, we are often told, is intermediate in character as in chronological position. It is the inheritor of Græco-Roman civilisation, and is an advance on it; just as, in turn, modern civilisation is the inheritor of mediæval civilisation, and is an advance on that. This doctrine, as compared with the earlier one, bases itself on a more systematic and extensive knowledge of the facts, especially of mediæval history; and if, by means of the new facts, a law of progress had been established, embracing all the three periods, the older view might be regarded as finally overthrown. But, as has been said, no law of progress has met with general assent. Those who speculate about the movement of history still take quite different views as to its predominant factor; and, when they agree about this, do not agree about the order of stages in the particular kind of progression—intellectual or other—to which they assign the predominance. This seems sufficient to justify a re-examination of the doctrine of historical progress. No doubt the older view by itself was too simple, and cannot be adopted in the form that was first given to it; but it is so obvious a view that we may expect it to contain some part of the truth. For, after all, the most important facts were known to the older as well as to the newer theorists. Those philosophers who have done most to bring the theory of continuous progress into favour have themselves said that it is the broad facts of history, and not minute details brought to light by curious research, that must serve as the basis for the supreme generalisations.

As a preliminary to the inquiry itself, it may be interesting to compare two views of human character that go naturally with the two theories of the historical movement. According to the notion that is now common, there is, for European society, a single progressive movement, which has been going on from the beginning of history. The most important thing about any man, whether of thought or action, is his attitude towards this movement. If he goes with the movement, he is progressive; if he goes against it, he is conservative or reactionary: and this is the essential difference between types of

character for all time. It may be that the greatest minds after those that lead the progressive movement are the great reactionists. The opposition does not mean a difference of degree in intellectual or moral force. What it means is that, of the leading minds, those that understand the movement of their time and go with it, to whatever age they belong, are to be classed together as progressive minds; those that oppose the movement of their time, as reactionary minds. Transferred to any other age, a mind of progressive type would always be progressive, and a mind of reactionary type always reactionary. Thus, for example, the Christian Fathers were the "radical reformers" of their own age. So also were the French Encyclopædists. The Encyclopædists and the Fathers, therefore, if they could have changed ages, might easily have taken one another's places. The last defenders of the Roman Republic were the political conservatives of their time; the last Neo-Platonist opponents of Christianity were the religious reactionists of theirs. As conservatives and reactionists, they are to be placed in the same class with the modern champions of Catholicism and Absolutism. At the same time, the movement, being continuously progressive, carries us all along with it. Hence the most extreme opponents in the same period have more actual resemblance to one another than those who are really contending for the same cause in distant periods. The most devout of modern religious thinkers, being placed in an atmosphere of questioning, cannot realise the "implicit" mediæval submission to authority. Essentially, all contemporaries who have acquired the ordinary knowledge of their time are at about the same stage of thought, some a little before and some a little behind. It is only accidentally that they either differ from one another, or resemble the men of distant periods.

The initiators of the modern doctrine of continuous progress do not, of course, put their theory quite in this way; but it will be acknowledged that such a view is "in the air;" and it is sufficiently logical. Let us contrast with it a theory that has the same kind of logical connexion with the doctrine of historical cycles. We meet with a theory of the kind in Machiavelli, who put forth a doctrine of cycles in political history, and, as

may easily be inferred from what he directly says, regarded the Middle Ages as the result of an overthrow of civilisation by the Christians and the Barbarians. According to Machiavelli's theory of human character, there are certain fixed types, alike in all ages, determined by nature, and made unmodifiable by habit. Men of a particular type of character, once formed, never cease to act in accordance with that character. If circumstances are favourable, they succeed; if circumstances are unfavourable, they fail. Half depends on us, and half on fortune. To take his favourite examples: The Consul Fabius did not adopt a policy of caution because he saw that such a policy was best for the time, but because he was naturally a cautious man. He was successful because caution then met the occasion; but, under any circumstances, he would have acted in the same manner. Pope Julius II. was a man of impetuous character, and succeeded because in his time the occasion was favourable to audacity; but, if the times had changed, he would not have been able to proceed with circumspection, and would have failed. "Hence it arises," says Machiavelli, "that a republic has longer life, and has good fortune for a longer time, than a principality; for it can better accommodate itself to the diversity of the times, through the diversity of the citizens that are in it, than a prince."¹

If we detach this theory from its special political application, and apply it to the fortune of ideas as well as of modes of action, we seem to obtain a rather deeper view than is given by the doctrine of absolutely continuous progress. In intellectual things, we may say, half depends on the ideas of the individual man of genius, and half on the particular currents of the age. The mind of the community is in a manner passive, and yet is not indifferently receptive of all great ideas alike. It has movements that make it now receptive of one set of intellectual influences, and now of another and opposite one. The leading minds, again, are not primarily distinguished as preferring conservation or innovation, but as preferring one state of things or another. According as the movement seems to be towards the state of things they desire or away from it,

¹ *Discorsi sopra la prima deca di Tito Livio*, bk. iii. chap. 9.

they are classed as innovators or conservatives ; but this distinction is secondary. The movement of human affairs being subject to reversals, the conservatives and innovators of one age, if transferred to another, would not seldom change places. Those who, during the dissolution of the ancient world, sought to preserve what remained of its characteristic civilisation, if they could have changed ages, might have taken part in the characteristic modern movement ; while the greater modern reactionists, if transferred to antiquity, would probably have been a revolutionary and dissolvent influence.

Reasonable as this general conception must seem, so far as it applies to individual character, intellectual or practical, it must be rejected if we accept the ordinary theory of progress. That theory, it is clear, needs revision.

CHAPTER II.

ANTICIPATORY SOLUTION.

IF justice is to be done to the modern doctrine that historical progress is strictly continuous, it must be considered as it presents itself in the work of those who have given to their historical generalisations most of a scientific or philosophical character. These are undoubtedly Comte and Hegel. In their theory of the relations of man to society, the two thinkers have much in common. Both have definitely advanced beyond the conception of the individual man as existing first in isolation, and then entering into the social union in consequence of an agreement arrived at for mutual advantage. The mind of the individual man, as both hold, could not exist at all as a human mind unless formed under social conditions. Both, again, regard continuity in human history as essentially a mental continuity. For a continuously progressive civilisation, it is not necessary that there should be identity of race, or even continuity of political structure. When a new race or a new state takes up the ideas of another, and carries them higher by its own efforts, it is spiritually the successor of the former, and represents the next term in historical progress. The special problem of "Philosophy of History" also is conceived by both in the same way. Its object is the history of European civilisation; the Asiatic civilisations being regarded, so far as they have properly historical interest, as preliminary to this. Regarded apart from European history, as Comte especially sees, they have simply the interest of social types; and their (more or less remote) future depends on their receiving an impress from the single progressive movement.

Both philosophers also have the idea of a *consensus* of social factors as existing at each stage of political society; so that to a certain extent one part of its structure could be inferred from another. As the counterpart of this idea, both insist on the conception of the social movement as a whole, and thus avoid the error of making any subsidiary order of facts, however fundamental, stand for all the rest.

Neither to Comte nor to Hegel did it seem, as it does to some recent writers, that progress could be taken as something known in itself; that ethical and political ends could be defined in terms of "progress," itself undefined. Unless they could have pointed to a law of historical evolution towards an end conceived with sufficient definiteness, they would have held the existence of progress unproved. For Hegel, the end to which history necessarily moves is the consciousness the human spirit has of its freedom, and, with this consciousness, the reality of freedom itself.¹ This end can only be realised by men living in organised States. The conception that the State exists for the sake of the spiritual freedom of its members, in the sense that this is what ought to be consciously aimed at by men living in political society, is found already in Spinoza: what Hegel really added to Spinoza's conception is the idea of history as necessarily bringing with it the greater and greater realisation of that which ought to exist. Comte, on his side, defines progress, not in terms of freedom, but in terms of the intellectual doctrine held socially. The human mind passes successively through three stages of philosophical thought. First it explains occurrences theologically, that is, by quasi-human volitions projected into things; then metaphysically, that is, by "entities," or realised abstractions; finally, it refuses all explanations except such as enter into positive science. These reduce themselves to simple statements of what invariably occurs. Each of these successive "philosophies," the theological, the metaphysical, and the positive, in turn is socially supreme; the triumph of the last being reserved for the future. Since the positive philosophy is alone true, intellectual progress is the gradual passage to

¹ *Philosophie der Geschichte* (Einleitung).

the social acceptance of a true philosophy. With intellectual progress, all other kinds of progress, and especially moral progress, are correlated.

In Comte's law there are two points to be considered: one is, whether it accurately sums up the historical stages of human thought; the other, whether it is, rationally, a "law of progress," and to what extent. That it is not the supreme law of intellectual progress becomes obvious when we find that there are unquestionable cases of advance in the highest philosophical ideas which cannot be brought under it. Whenever in any subject a point of view has been attained that enables us to incorporate or to reject earlier theories with full insight, we have direct evidence of intellectual progress. It is, at last, only by proceeding from this kind of evidence that we can learn whether there has really been progress of thought or not. Now the two great examples, thus verified, of progress in philosophic as distinguished from merely scientific thought, are the idealistic theory of the external world, associated with the name of Berkeley, and the theory of inductive logic, associated with the name of Mill. These are cases of definite philosophical advance beyond anything actually attained by the ancients. Of the two, the first could only be brought under Comte's law with difficulty, and with modification of what he himself meant by it; and the second could not be brought under it at all; for material logic, to which the advance made by Mill belongs, does not supersede the Aristotelian formal logic, but is simply an addition to it.

But further, if we understand by intellectual progress advance in the highest ideas attained at any time, this may be shown to depend on intellectual freedom. That the greatest possible advance may be made, the individual thinker must be always free to go to the grounds of belief, and to accept or reject all or any part of the system that prevails socially. And on this kind of progress, made by individual minds, progress in the ideas that are socially effective depends; for "the general mind" invents nothing, but only takes up by degrees as much of the insight of individual minds as it can turn to account. Thus, if we still suppose that a supreme law of

intellectual progress is discoverable, it appears that advance in freedom must be placed socially before advance in thought considered apart from freedom. Only in so far as there is freedom can an intrinsic law of intellectual development manifest itself. Hegel's formula, therefore, seems preferable to Comte's as an indication of what we are to look for when we are trying to ascertain the meaning of history. Instead of taking the formula as a law of history to be assumed from the beginning, we must, however, take it at first only as a test by which to learn whether in the whole or in any section of history there has actually been progress.

Tried by this test, the passage from antiquity to the Middle Ages can scarcely be regarded as a progressive stage of history.

During the whole period from the origin of Greek philosophy to the victory of the Christian Church, there was practically complete freedom for the expression of individual thought. This was secured by the acknowledged supremacy of the State in all relations of life where there is any question of applying force; and by the absence of any corporation having for its office the authoritative preservation in its purity of a doctrine which all are to accept. The ancient European civilisation had religions indeed, but it had no churches. Nor was the State itself at the same time a Church. Essentially the State aimed at its own preservation or extension first, and then, in its best manifestations, at certain æsthetic and ethical ends to be realised in the lives of its citizens. Religion was so little a social creed that it could even be supposed to have been created by the poets, who, though they had not really created it, had given it æsthetic form under the law of their own imagination, and under no external discipline imposed socially. Politically, indeed, the State assumed the right to repress teachings or modes of worship that were contrary to the public good; but, whether the political authorities made mistakes or not, it was always the public good that they professed to have in view, and not the purity of a speculative creed. There was no thought of repressing speculation, or even of prohibiting worships, except so far as these might be thought to have for

their natural and direct consequences the dissolution or weakening of the State. Thus there was no religious persecution in the proper sense of the term.

This social condition is precisely the opposite of that which was established during the Middle Ages. Here the freedom of the individual mind, when the most is conceded to it that the mediæval system ever did concede, is reduced to an activity within the limits of a received doctrine, more and more definitely formulated. The whole speculative class is brought within a separate corporation, and placed under a centralised intellectual discipline, having for its supreme end the preservation of a common doctrine. While in antiquity any checks that were deliberately imposed on the expression of opinion, or on modes of worshipping the gods, were understood to be for the sake of the State, here the State itself was regarded as an instrument for applying coercion to individual deviations from the corporate creed and ritual. So far from such deviations being regarded as subjects for repression only when they tended to the injury of the State, the utter dissolution of the State itself was regarded as preferable to the existence of a mode of worship or of opinion not approved by the separated and disciplined representatives of the triumphant doctrine.

Now this second system is evidently as unfavourable as the first is favourable to free individual thought. Whether we prefer the first system or the second, there is in any case a reversal. The transition from antiquity to the Middle Age is the end of one state of things and the beginning of another. If, then, we accept Hegel's formula as a test by which to recognise progress, we do not actually find continuous progress all through European history.

Applying the same criterion, we perceive another reversal in the transition from the mediæval to the modern period. The State now begins to re-assume supremacy in practical life, and, correspondingly, the working out of theories is left more and more to the free movement of the individual intellect, no longer enclosed in a separate corporation. Scientific and philosophical freedom is thus regained by degrees; and after a time deviations in worship are again permitted. In this

social expression, or in religion, modern freedom is greater than ancient; though in philosophy, its essentially individual expression, it is not greater, if even yet it is as great. Ancient philosophy at least claimed to decide, for those who devote themselves to it, and as far as decision is possible, upon all that can be believed as well as known; while modern philosophy, even with the aid of science, often hesitates to make this claim, yielding at some point to the still surviving claims of larger or smaller corporations.

If, as has been said, intellectual freedom is the condition of the discovery of truth, then we should expect to find also that any rational formula of intellectual development would be inapplicable to the whole history of Europe; that the mediæval system of thought as well as of life would appear as a break or as a prolonged reaction. Comte's formula, though not an adequate expression of philosophical progress, may be taken as true at any rate to this extent, that the progress of philosophy depends on contact with advancing science. This, then, in the absence of any other, may serve as the intellectual criterion. Comte himself may be considered to have been biassed in his application of it by antipathy to ancient and modern "unlimited freedom of thought;" holding as he did that intellectual freedom ought in the end to be reduced precisely to the dimensions it had in what has been called "the classic Middle Age." When definitive principles shall have been established, he says, "their irresistible preponderance will tend to make the right of examination return finally within its truly normal and permanent limits, which consist, in general, in the discussion, under fitting intellectual conditions, of the real connexion of the different consequences with fundamental rules uniformly respected."¹ This is also, in principle, the doctrine of the modern Scholastics. For the Positivist, as for the Catholic, there would be no doubts going to the root of belief, but only a kind of fictitious or "probative" doubt assumed provisionally for the sake of better establishing a foregone conclusion. To preserve the social doctrine finally accepted, there would necessarily be a Church—a separate

¹ *Philosophie Positive*, t. iv. pp. 45-6.

corporation with a centralised moral and intellectual discipline. The State would again be "subalternised," as the Churches have been partially subalternised during the last three or more centuries. This being Comte's social ideal, there is peculiar interest in seeing how far the historical Church realised his law of intellectual progress. Is it not perfectly clear that when the social supremacy had passed from statesmen to churchmen, the directing ideas, after having been mainly what Comte calls metaphysical and positive, became again theological? He himself tries to prove an advance by laying stress on the transition from popular polytheism to monotheism; monotheism, as compared with polytheism, being, in his view, an attenuated form of theology. But then the minds that practically directed things, in antiquity, were guided by the idea of the State as an organism having an end of its own. For them, the popular religions were now an instrument and now an obstacle. So far as they were influenced by ideas not simply taken in from the general social atmosphere, it was by the ideas of philosophers; and these, if not "positive," were at least "metaphysical." On the contrary, under what Comte himself in one place calls "the sombre monotheistic domination," it was precisely the most theologically minded that gave the direction. Political and intellectual development, as such, were things to be suppressed or controlled, or at most compromised with in the interests of a theological ideal. According to Comte's own formula, therefore, the directing ideas were reversed. Catholic monotheism, according to his own view, is not really more true than pagan polytheism, but, as we might express it, is an advance in that it gives the Olympians a single neck, which the Positive Philosophy can proceed to cut with more facility. But the final concentration of a power that it is held ought to be destroyed is not, for the people who live under the concentration, an advance. It may be a condition of there being a greater advance afterwards than could otherwise have been made, but temporarily it is best described as a reaction.

On the principles of those who have put forward the doctrine of continuous progress, we find, therefore, that in European

history there are really two reversals of the directing ideas. A social system involving the practical supremacy of the State, and intellectual liberty for the theorising class, is succeeded by a system in which a Church is supreme and all speculative minds are subject, in their thinking, to a coercive discipline; and this second system, again, has to give place to a system which in essentials is a return to the first. Or, looking at the process from the point of view of theoretical doctrine, an age in which metaphysical if not positive ideas rule, gives place to an age dominated by theology, and this again to an age marked by a constantly increasing intellectual influence from metaphysics and science.

Wherever, therefore, continuous progress may be, it is not hitherto, at least for the whole history of Europe, in the directing ideas, whether we seek for these in the theoretical beliefs of the ruling minds, or in the principle of the social system. Yet, though in this respect there may not be continuous progress, there is at least continuity. This idea of philosophers like Comte and Hegel has now passed into the consciousness of historians who are not philosophers. And, where there is continuity, the analogy of development in the individual mind leads us to expect continuous progress in some things by mere accumulation and elaboration of experience.

In the search for real laws of social continuity, Comte is a much better guide than Hegel. Whereas Hegel, when he comes to details, simply puts down the facts and tries to connect them by a perfectly illusory "dialectic," Comte not only has the general conception of a social science, but has discovered the scientific method of determining its laws. For Comte, Philosophy of History is a special problem of the science of Sociology; and this is based on a series of lower sciences arranged above one another in order. What is probably a more definitive achievement than either his "hierarchy of the sciences" or his "law of the three states," Comte has discovered the method called by himself "historical," and placed by Mill, under the name of the "inverse deductive method," in relation to the supreme scientific principle of the

uniformity of nature. Laws are first to be obtained by provisional generalisation from historical facts, and are then to be verified by deduction from laws of mind, that is, from psychological — or, as Comte says, biological — laws. Now, although no supreme law of social development may yet have been arrived at by this method, changes of an important though subsidiary kind are already seen to follow one another according to laws that are in process of formulation. Domestic and industrial changes are becoming scientifically intelligible.¹ And the laws that it is possible to formulate seem here to be laws of progress. The merit of Comte's own historical construction is to a great extent in his grasp of the subordinate and sub-conscious processes that make up so large a part of human history. The slow changes of the military and industrial systems in Europe, and the gradual modifications of feeling that correspond to these changes, are especially the object of his interest. These he has dealt with in such a way as to show frequently how progress was constantly going on underneath the surface. Progress of this kind, as contrasted with progress in directing ideas, may be called "instrumental." Comte himself, in considering the directing ideas, almost admits sometimes that there are breaks or reactions. The ordinary believers in continuous progress could, of course, find in him support for their notion of an ever-enduring fundamental struggle between "the spirit of conservation" and "the spirit of amelioration," which, indeed, follows from his general doctrine; but, for all that, his insight makes him see that ancient civilisation was really more "organic" than mediæval civilisation. He finds that the whole period from the beginning of the Middle Age till now has been only "an immense transition."² The really "organic" states are the typical civilisation of classical antiquity and the definitive social state of the future. Thus Comte, whether in spite of

¹ It may be noted that additional precision has been given to Comte's and Mill's historical or inverse deductive method by Dr. Tylor, who, by an application of the mathematical theory of probabilities, has shown how to obtain proof that there is *some* causal connexion between social phenomena, before proceeding to the verification by deduction.

² *Philosophie Positive*, t. v. p. 115.

himself or not, supplies us with a basis for allowing progress in one respect while denying it in another. The continuous progress, as it now appears, we are likely to find in the sub-conscious and instrumental part of social life ; the discontinuity, so far as it exists, in the directing ideas.

Comte has remarked that progress in the Middle Ages was chiefly political ; and this remark might be justified by pointing to the two modifications which are the principal grounds of the superiority—at least potential—of modern political life to the best that could be attained in antiquity. These two modifications are the disappearance of slavery in Europe as a legal status, and the introduction of the system of representation as a means of government. The first makes “the freedom of all,” as Hegel expresses it, and not merely of “some,” henceforth the ideal ; the second has made compatible with political freedom the organisation of nations, and not merely of cities, into single States. Both modifications appeared as the result of slowly acting social causes in the interval between the two transitions, from the ancient to the mediæval, and from the mediæval to the modern world. At the beginning of the Middle Ages neither of the two could have been consciously effected ; at the end both were ready to be seized upon by those who were sufficiently inspired with the ideal of liberty.

Both these modifications, in a manner, are instrumental. They are not the end, but are subordinate to it. Little would have been gained by the disappearance of slavery if it had merely given place, for example, to the definitive organisation of a system of caste, as it might easily have done under the guidance of the Church.* And in fact, as has often been remarked, slavery could appear again in modern times under new conditions. The action of social forces unguided by ideas was not sufficient to dispose of it finally ; it had to be abolished consciously in the end, not without a long-continued

* Neo-Scholastic moralists still regret that some more stringent social division than that of the modern classes cannot be restored. See *Moral-philosophie*, by Father Cathrein, S.J. Of course, the passage from one caste to another, admitted by Plato in his outline of the system (*Republic*, bk. iii.), would have been indispensable in the case of the priesthood.

influence from the "revolutionary metaphysics" of the eighteenth century. The case of representative assemblies is similar. Without the consciously formed determination to make these an instrument for preserving or acquiring freedom, the mere emergence of the device of delegation would have been of little worth. When this is admitted, however, it is hardly possible to exaggerate the importance of the two changes. Directing ideas, on their side, must inevitably fail to effect anything for the whole of society unless social modifications of the right kind occur; and these are not to be produced merely by "taking thought."

This, then, suggests itself as a provisional solution of the question that was put. European history is continuous, and beneath the surface there have always been going on changes that may be called progressive; but European civilisation, if we take its highest points in successive ages, has not been continuously progressive. The mediæval period, in its distinctive character, is an enormous reaction, and the modern period is in essence a return to an older state of things. It is not a simple return, because there have been continuously progressive changes underneath; it is a return to the directing ideas of antiquity enlarged and modified by these progressive changes. If in some respects it still seems inferior to the great age of ancient civilisation, we must always remember that, as Comte says, the modern transition is not yet terminated.

CHAPTER III.

CAUSES OF THE TWO GREAT TRANSITIONS.

THE causes of the apparent discontinuity in European history have been set forth from many different points of view ; and the elements of a sufficient explanation have to be sought in many different quarters. The two recent writers, however, who have conceived the problem in its greatest generality seem to me to be M. Renouvier, in his remarkable book *Uchronie*,¹ and Dr. H. von Eicken, in his thorough and elaborate *Geschichte und System der Mittelalterlichen Weltanschauung*.² Still proceeding by the critical method so far adopted, we may take these two books as the starting-point of an attempt to make the two transitions intelligible.

M. Renouvier's book is not directly a theory of the actual course of European history, but a series of pictures of the way in which things might have gone if, at certain crucial points, the men who had the practical direction of affairs had taken resolutions different from those which they really did take. His explanation of the transition from antiquity to the Middle Ages, indicated by this means and partly set forth in an introduction, is that the whole series of events, culminating in the victory of the Christian Church over the Roman Empire, was the result of a prolonged reaction of the East upon the West. During the period of the great conquests, from

¹ *Uchronie* (L'Utopie dans l'Histoire). Esquisse historique apocryphe du développement de la civilisation européenne, tel qu'il n'a pas été, tel qu'il aurait pu être. Paris : Bureau de la *Critique Philosophique*, 1876.

² *Geschichte und System der Mittelalterlichen Weltanschauung*. Von Dr. Heinrich von Eicken, Staatsarchivar in Aurich. Stuttgart : J. G. Cotta, 1887.

Alexander to Cæsar, the Western world was gradually Orientalised. The first stage in the process was marked by the passage from political freedom to despotism. The ethical effect of this political change was that for the ideal of equal justice there was substituted, on one side, the self-will of the despot and the submission of his slaves, on the other side the absolute renunciation of ascetics and mystics fleeing from the world. With this contrast between "anti-morality" and "supra-morality"—a contrast characteristic of Eastern despotisms—go certain metaphysical characters of Eastern creeds. The ground having been prepared in Europe, Oriental religions began to fascinate the Western mind. Among these was the doctrine of the Christian Church—a doctrine which was essentially Orientalism adapted to Europe. It soon became clear that the spread of the Orientalising sects, if unopposed, would destroy Western civilisation; but it was also clear that, without a return of Western civilisation to its original principles, all opposition would be unsuccessful. This return (in *Uchronia*) was made at a date corresponding to the end of our second century. A succession of emperors, acting under the inspiration of the Stoic philosophy, aims at gradual limitation of the autocracy and final restoration of the republic. The new sectaries are banished to the East, which at last has to be wholly abandoned to them. In this way Greece, Italy, Spain, and Southern Gaul are rescued for civilisation. After a time, when it has undergone certain internal changes, and has become capable of taking its place within a system of mutual toleration, Christianity is re-admitted on equal terms with the teachings of the ancient philosophic schools. Under the direction of those schools, and in particular of Stoicism, political and ethical progress has, in the meantime, been continuous. The development of European civilisation has thus been greatly accelerated.

To the underlying conception of the book the objection may be taken that it attributes to the actual course of events too much of a casual character. M. Renouvier is an indeterminist, and holds that events might really have been different; not merely that if, at some point, they had been slightly different,

which was really impossible, the course of things from that point would have been greatly modified. Still his conception may, for the use of determinists, be corrected in this sense. It might be said that the second century was a period when, if slightly different resolutions (really impossible) could have been taken, the world's history would have been fundamentally changed. Even in this form, however, the hypothesis will probably still fail to commend itself. The causes that were at work, it may be maintained, were too widespread and too deep to be much affected by any conceivable decision on the part of individuals. We may sympathise with those who, even in the fourth century—when, as M. Renouvier admits, the contest was really hopeless—still struggled with the conquering darkness, and yet hold that the dark ages were inevitable, that they were a fatality and in no sense an accident.

What remains of permanent value in M. Renouvier's imaginative construction is the conception of the new religion and of the Church in which it was embodied as the final expression, not wholly of an intrinsic European development, but in part at least of a development set going in Europe by external causes. Thus a real correction is made in the idea of those who think that Europe, of itself, and without contact with Asia, would in some way have given birth to Catholic monotheism. On the other hand, the too exclusive view of the causes as consisting in an external contagion, partly explains why an almost accidental character is attributed to the Catholic transformation. It has to be modified in its turn by the conception of a more intrinsic "Orientalising" process in Europe itself.

A conception of this kind is common in German historical speculation. In Dr. von Eicken's book it is conceived with great definiteness, and applied with special power to the whole system of mediæval thought and life, which the author has widely and carefully studied in original sources. The whole process of European history is conceived as the intrinsic development of one state of things into its opposite, and the return of this to the former state modified by consciousness of the opposition. At first human life, without any self-con-

is continuous with what was kept under in the Middle Age. The growing political life of the new nations and of the towns, the development of new languages and literatures, and of renewed philosophy, science, and art, and generally all the forms of growth to which modern students have had their attention drawn, are not organic parts of the theocratic system, but are the forces which were to break through it. They may for a time be brought under control and into an appearance of unity, but essentially they are hostile to the theocracy; and, when growing civilisation has gained force enough, the theocracy is shattered. This is what Dr. von Eicken has made evident, even though he sometimes speaks of the system as if it had really been an organic whole.

But what was it in ancient civilisation that made possible the victory of the Catholic creed and hierarchy, and of nothing else? The causes set forth by von Eicken and Renouvier explain the result in part; but, it may still be asked, why did not a system like Neo-Platonism, which, as well as Catholicism, had a dualistic metaphysic and an ascetic morality, serve as the centre for some new organisation? Neo-Platonism, though not truly "reactionary" in its opposition to the Christian Church, but rather in what it had in common with it, was a reaction within ancient thought. How was it that this reaction was not sufficient, and that a creed and organisation, not simply modified by Asiatic influences, but proceeding from Asia itself, gained the victory? The answer to this question is to be found in ancient religion; as has been seen more or less clearly by writers whose theological or anti-theological belief was sufficiently intense to direct their vision to the phenomenon. The theological spirit in the ancient European world was unextinct. Though Greek religion in its practical manifestations was controlled by State-policy, and though myths, intrinsically beautiful, were freely brought under the æsthetic and ethical form they chose by the poets, it had also a darker side. This was still more the case with the religion of other races. Ancient philosophy was indeed free; but in its physics it was only able to throw out conjectures, and these were not sufficient, outside the philosophic

schools, to subdue the "terror of mind" that was produced by the ascription of arbitrary volitions and human passions to the gods. There was always the thought of expiation in its primitive modes, and the search for objects of sacrifice. Hence the following that the orgiastic Eastern worships, with their more powerful stimulus to devotion, constantly gained in spite of discouragements from the political rulers. Now, Christianity, as soon as it begins to appear historically, is provided with supernatural terrors far beyond those of the other ancient religions. Opposition to it on the ground of verified science is impossible. Its chief philosophic opponents themselves take to thaumaturgy. The political opposition is the opposition of mere material force. Religious opposition founded on custom is easily overcome, for many reasons, and especially for this, that Christianity was represented by a hierarchy formed on the Asiatic model. Such a hierarchy, more potent than those of the East, because detached from the State, is now brought into action for the first time in Europe—unless the Druids, whom Joseph de Maistre perhaps rightly regarded as the European precursors of Catholicism, are an exception. The Druidic organisation was of course only rudimentary, and it had been in part at least crushed by the Roman government; so that, while it might aid the new religion, it could not oppose it.

Thus the classical world has nothing that can in the long run offer an effective opposition to the organisation of supernatural terror by the Church. Where, as in Persia, the new religion was met on its own ground by a pre-existing theocratic State, it did not make way. Christianity had not yet developed the military fanaticism by which Islam afterwards conquered Western Asia. What it needed was the spiritual preparation of the Orientalising process—called by Christian Fathers *præparatio evangelica*, together with the absence of effective barriers; and both these conditions were found. To consolidate its creed and organisation, as modern investigators have so convincingly shown, the hierarchy at the same time made use of European instruments—Greek philosophy and Roman policy. But for its principle of life it had first to attach itself to the darker side of "natural religion."

This religious point of attachment it of course found also among the unsubdued barbarians ; and if these had not been politically prepared by long subjection to an autocracy, they were on the other hand much more subject to the intellectual prestige that Catholicism exercised from the time when it became the religion of the Empire. They had to receive their education at the hands of the hierarchy, which had now brought all the elements of culture under the form imposed by itself.

A hierarchy inheriting the Jewish exclusiveness, and at the same time aiming at universality, was necessarily intolerant in a way that merely national theocracies of the olden type could not be. The similar intolerance of the Mohammedan Church may no doubt be traced to the same origin. Fixation from the very first of "intolerant uniformity" as the ideal of Catholicism is well brought out in Dr. von Eicken's work. He ascribes it to the resistance the Church met with from ancient philosophy. As the Roman State sought to suppress the Church politically, so Greek philosophy threatened to destroy its unity by introducing heresies. Hence its double effort, from that time traditional, to subdue all States, and to repress all independent activity of mind. The force of the State, when this could be commanded, was directed unremittingly against heretics. When it could not, the State itself was broken up by the calling in of other tribes to subdue those that had revolted from the Catholic faith. The interests of doctrine and discipline were, to those who really represented the spirit of the ecclesiastical organisation, before all others. This is seen in the struggle with the civil power that went on in various forms all through the Middle Ages. The plea was always "the liberty of the Church." This watchword, as Dr. von Eicken shows, did duty through every phase of the Church's history, alike when it was struggling for independent existence, when it was aiming at mastery, and when its proclaimed purpose was nothing less than to substitute a universal theocratic State, with the supreme power in ecclesiastical hands, for all the "temporal" governments of the world.

It was only for a moment that this last aim was possible.

In the political as in other spheres of mundane life, the Church had to content itself, even in the time of its greatest power, with a compromise. To the State were assigned the lower, to the Church the higher interests. One point brought out by Dr. von Eicken is specially noteworthy; and that is the resemblance between the authorised mediæval view of the State and the modern doctrines that would limit State-functions as much as possible. The mediæval view found the origin of political society in a contract,¹ and assigned to it merely such ends as "the protection of life and property." All the higher interests of civilisation were exclusively in the province of the "spiritual power." Towards the Church the function of the State was simply to act as the "secular arm."

In the end, then, the Middle Ages had as their ruling power a well-compacted logical system, assigning its place somehow to every relation of life, and compromising with human nature when it could not suppress it. Beneath there were all kinds of forces tending to get loose; but in the meantime the system was so logical that it could only be broken through intellectually by an inconsequence. At the centre of the system was the doctrine of a supernatural revelation. When the philosophic doctrine of the Church was formulated by Aquinas, this was drawn out as a necessary consequence of the dualistic separation of God and the universe. And the supernatural Christian revelation—the deduction proceeded—being above rational knowledge, required the Church as mediating between the Deity and human reason.² From these positions everything else could be obtained. The system being thus logically constructed, and once made dominant in theory and practice, how was it ever broken through? The answer is already clear. It was essentially by the irrepressible reaction of the European mind, to which this system was after all external. Leaving the complex growth, in practical life, of the forces which on that side were to contribute to its overthrow, I may here select for special examination the gradual restoration in Europe of the ideal of intellectual liberty. The

¹ *Geschichte und System*, &c., p. 367.

² Von Eicken, *Geschichte und System*, &c., pp. 609-10.

disparate phases of this process, though they have all been set forth, have not, so far as I know, been brought together by any one in connected order.

The development of Scholastic philosophy, or philosophy under the dominion of the Church, has been divided by the historians into two main periods: the first, from the beginning of the ninth to the end of the twelfth century; the second, from the beginning of the thirteenth to the late fourteenth or early fifteenth century. Now, although the Church ruled over this development, the speculations that appeared within it were far from being always orthodox. The impulse that set the Scholastic philosophy going proceeded really from the inquiring spirit of the re-awakening European intellect, not from the dominant power of those ages. The first attitude of the heads of the Church towards learning has been aptly compared to that of Shakespeare's Jack Cade.¹ During the first period, however, there was no conscious heterodoxy. Those who were most heterodox, and were afterwards condemned by the Church, thought they were attaining understanding of the faith. To attain this understanding was the aim of the first period. When an individual thinker arrived at a result that was authoritatively condemned, he could be brought at that time to make real submission, internal as well as external. The Church's ideal of the uniform, single, authoritative, and only true doctrine had been too deeply fixed, during the period of transition from antiquity, to be even questioned as yet. The effort to understand the faith, however, ended in failure. It was not really to be made intelligible without running into heresies. The result was, at the end of the twelfth century, philosophical (not religious) scepticism, and mysticism.

The number of philosophical works preserved from antiquity had hitherto been extremely limited, and they had been almost exclusively logical. It was on this scanty material that thought had so far proceeded. Exactly at the time when the first movement was beginning to be exhausted, there came the influx into Western Europe of new Aristotelian and other

¹ Hauréau, *Histoire de la Philosophie Scolastique*.

ancient philosophical works, with commentaries and more original writings of the Arabian philosophers.

The new writings set going a new philosophical movement more powerful than the first. With this movement the Church, after trying to resist it, entered into a compromise. Philosophy was to become the handmaid of theology. The doctrines of the faith were mysteries, and could not be philosophically understood ; but philosophy might work in their service, and organise natural knowledge in subordination to them. Aristotle could become the instrument of the theocratic system. Under the influence of Neo-Platonist writings, at first supposed to be Aristotelian, doctrines now consciously heretical had in the meantime broken out ; but the philosophical, as well as the contemporary religious heresies, were extirpated by the traditional methods of the Church, made more systematic, and the movement of thought, so far as it appeared reconcilable with orthodoxy, could go on. This movement too, so far as it was subordinate to the faith, ended in failure. The most submissive philosophy could not become entirely subservient to theology. When it was Platonist, it tended to Pantheism ; when it was Aristotelian, it led to purely destructive conclusions where mysteries were concerned, and left no way of reconciliation open, except absolute separation between the domains of knowledge and of faith.

The second Scholastic movement ended, like the first, in scepticism and mysticism ; but now came for Western Europe the re-discovery of Greek philosophy in its original sources, and this led to another and yet more vigorous movement of thought, no longer confined to ecclesiastics, but going on in the world at large. Living thought had now passed definitely beyond the Scholastic stage. After the transitional period, lasting from about the middle of the fifteenth to about the middle of the seventeenth century, we come to modern philosophy proper ; which is characterised by the definite recognition, already formulated by some of the later mediæval Nominalists, of independent spheres for philosophy and theology.

Within this general scheme, which is that of M. Hauréau, can be brought all the philosophy that does not, by claiming the whole of human thought and conduct for its domain, come forward as a rival to theology on its own ground. But the most remarkable philosophising of the Renaissance aimed at such completeness; and there have been systems since that have set before themselves the same ideal. For its basis, a system thus complete henceforth requires definite assertion of the "liberty of philosophising" as a principle. So far we have only seen philosophical liberty put in practice, within widening limits indeed, but constantly checked, and not protesting against all limitations alike. The division of spheres regarded as "modern," if it were finally accepted, is compatible with a certain kind of spiritual supremacy for societies claiming to teach revealed truth. But the proclamation of liberty of philosophising as a theoretical principle requires assertion of the right, not only to think in independence of religious faith, but to contest the doctrines of the faith as philosophically false.

The first assertion of this right appears in the doctrine of the "double truth," borrowed by some of the Scholastics of the second period from Averroes and other Arabian philosophers. According to this doctrine, the same opinion may be true in theology and false in philosophy, or true in philosophy and false in theology. The Averroistic doctrine of the "active intellect," one and identical in all men, and enduring immortally while individual personalities appear and disappear, was said to be true philosophically, though false theologically; as, on the other hand, the doctrine of creation *ex nihilo* was true theologically, though false philosophically. The distinction was, of course, condemned both by the Mohammedan and by the Catholic theologians. To the modern mind, it is not at first very comprehensible; but it had for its inventors a perfectly intelligible meaning. They desired to be philosophers to the full extent, and not to be theologians at all. At the same time, they saw that permission to philosophise quite freely could only be obtained—if it could be obtained even then—by some recognition of the claims of theology.

The recognition could be given on this ground. Philosophising must always be confined to a few. Only the few can, for example, attain to understanding of ethical precepts, and practise them out of insight. The majority must accept them as commands. For the many, the commands of morality need not only the sanctions of human law, but something beyond. They have this in the "supernatural sanction" provided by the theologians. Theology may therefore be admitted to be useful; and its utility may be described as a sort of "truth" relative to practice.

The distinction between two contradictory kinds of truth, thus developed, was the only possible formulation against dominant theology of the claim to absolute philosophical freedom. But how did the Arabian philosophers, and afterwards the Western Scholastics, come to make a claim of the kind at all? It was really incompatible with the logic of either theocracy, and it was not thought of in the first period of Christian Scholasticism, though minds were already very active in that period. How was it that it came to be, as Renan expresses it, "from the thirteenth to the seventeenth century, the breastplate of incredulity?"¹ The solution seems to be this. The Arabian commentators had in their hands works of Greek philosophy in sufficient abundance to find there the record of a state of things in which philosophical thought could go on undisturbed by the authorised expositors of a religious creed. Desiring to follow the ancient philosophers, they saw in their way the claims of theology. Mohammedanism, like Catholicism, claimed for itself the possession of absolute truth, and was prepared to enforce its claim. The ideal of "intolerant uniformity" could not be directly brought in question. It was therefore put aside by the assertion that there are mutually incompatible "truths," and the position assigned to it justified by a first sketch of a philosophy of religion. The doctrine of the two truths, finding exactly the same conditions on Christian ground, was afterwards easily accepted among the freer thinking Scholastics. That this is the right solution is confirmed by the way in which the distinction was pro-

¹ *Averroès et l'Averroïsme*, p. 258.

longed during the period between mediæval and modern philosophy. As put forward again at the Renaissance, it was not simply a continuation of the Averroistic tradition; being met with also among opponents of Averroism. It had an independent source in the increased knowledge of the conditions under which thought had gone on in antiquity. The liberty of philosophising is now explicitly traced back to the Hellenic tradition.

The first conscious assertion of philosophical freedom by mediæval philosophers was, according to this view, a Hellenic revival. Not only was it in spirit a return to antiquity, but it was directly suggested by study of the translations of Greek philosophers. The peculiar form it took at first, exhibits more clearly than anything else the profoundly inorganic character of the Middle Age. This mode of distinguishing between philosophical and theological truth, as has been remarked, has become almost unintelligible to moderns; and there was no distinction of the kind in antiquity. "Exoteric" and "esoteric" were merely terms applied to less and more abstruse philosophical teaching. The many and the few were substantially on the same ground of a human life approximately at one with itself. Europe could not recover this kind of unity till, by the spontaneous development of the northern races, and by the return of all to ancient sources of life, it could throw off the yoke of a spiritual domination foreign to its genius. And just as the theocracy could not permanently retain its power in Europe, so, under Islam, the philosophers who followed in the footsteps of the Greeks left no trace of themselves. Their memory as philosophers has been preserved in the West, but not in the East. There the Hellenising movement in thought could find no support in the surrounding life. The natural impulse of the Mohammedan Church to get rid of all philosophy that had its source anywhere but in the Koran met with no obstinate resistance either in the ranks of theologians or outside. After the twelfth century the Aristotelian philosophy disappeared.¹

In the European Renaissance, the distinction of the two

¹ Renan, *Averroès et l' Averroïsme*.

truths is not only continued, in spite of ecclesiastical condemnation, but takes on modifications more hostile to theology. It is said now rather that theology *ought to be* than that it is ethically useful. It ought to apply its sanctions to promote morality, but it really applies them to promote belief in its own dogmas, condemning to Tartarus all who will not believe them. But belief in dogmas is not in itself a part of morals; it is merely useful for those who cannot otherwise be brought to act virtuously. What, then, is the remedy that begins to suggest itself? The remedy is that the theologians shall be brought to order by the civil power. They shall be prevented from disturbing the world by their quarrels; deprived of independent coercive authority; obliged to teach simply with a view to practice; and not allowed to interfere directly or indirectly with the freedom of philosophers. These modifications, with others, begin to appear in Giordano Bruno. There is as yet no thought that diversities of worship can be permitted, at least in the same State. It is enough that individual thought should be free, and that religion should be brought under some kind of moral rule.

This idea of the supremacy of the civil power in matters of religion has a permanent truth and value. Spinoza's classical defence of philosophical liberty incorporates it as an essential part of the theory.¹ The position is that acts of worship, and public teaching of opinions, when there is any question of deciding whether they are permissible, ought to be placed, like all other kinds of action, under the decision of the one power entitled to exercise coercive authority in a commonwealth; and that this power is not the representative of a system of doctrine, religious or philosophical, but the representative of the general sense of the community. The supremacy of the State is the practical security for freedom of philosophising; as freedom of philosophising is not contrary to, but rather promotes, the efficient action of civil government. Accepting this position, we may say that all who, from mediæval times onward, had supported the claims of the civil power to control the ecclesiastical, whatever might be their immediate political aim,

¹ *Tractatus Theologico-Politicus*, c. xix.

had really been working towards intellectual freedom. The last and greatest of these was, of course, Hobbes.¹

Intellectual freedom is now conceived quite generally (though still with some preservation of old distinctions) as the freedom to pursue all scientific and philosophical studies, and to put forth all speculative conclusions, without regard to the beliefs of Churches. These beliefs the philosopher is not to be required to acknowledge as *true* in any sense. For those who can receive moral precepts only as commands, and cannot attain to them philosophically, theology has its value. Established Churches are of right dependent on the civil government; there being no special power in ecclesiastics to formulate authoritative doctrines, much less to impose them. The State, in its regulation of the creeds of Churches, ought to simplify them as much as possible with a view to their practical efficiency, and to clear them of all mixture with speculative propositions that have no bearing on morals. It is in this sense that the realms of faith and science are to be kept apart; not in the sense that there is a possible higher sphere of speculation open only to religious faith. The men of science and the philosophers go in knowledge and speculation beyond the men of religion.

The idea of religious toleration, though not made so explicit as that of philosophical freedom, is implicitly contained in these positions. According to Spinoza's principle, what has to be decided is whether a particular worship is compatible with the peace and preservation of the commonwealth. Now, when religious toleration became an immediately practical question, it was expressly argued on the ground that, for the proper ends of the commonwealth, there is no need of interference with the liberty of any body of persons to set up the kind of religious worship and profess collectively the doctrines they choose.² The question became practical through the

¹ See Croom Robertson's *Hobbes*, p. 225, for a statement of the historical relation between the doctrine of Spinoza, with its vindication of "the indefeasible right of the subject to individual liberty of thought," and Hobbes's political doctrine.

² See Locke's *Letters for Toleration*. The classical English contributions to the defence of free *individual* expression of thought are, of course, the *Areopagitica* of Milton, and Mill's *Liberty*.

division of sects, and the impossibility of maintaining peace except either by the method of Toleration or by the methods of Catholicism. This has perhaps led to the notion we meet with here and there that modern liberty in matters of opinion is merely an empirical result of religious divisions; that it is a kind of afterthought which men would never have had at all if a number of parties had not first aimed at exclusive supremacy. In reality, the idea of intellectual freedom, as has been seen, appeared long before the break-up of external religious unity; and, after this had taken place, was advocated without special reference to it. The Inquisition, where it existed, was successful in crushing all kinds of freedom for a time. In countries that were not subjected to the Inquisition, the idea of the philosophers had its opportunity. As soon as practical struggles had become too inconvenient, it could easily adapt itself to the special circumstances, and aid in the establishment of a new system, capable of becoming as logical as the Catholic system, though absolutely opposed to it.

The supreme idea of the modern system in its logical form is intellectual freedom. Thought and its expression are to be unrestrained by any coercive authority, either governmental or, if possible, social. In fact, intellectual freedom depends as much on the general spirit of a society as on the laws of the State. The thing that has been secured by law is toleration for "free churches"; and this is merely a special application of the principle of freedom to peculiar circumstances. And there must always be this reservation where religions are concerned, that if their corporate action becomes pernicious to the State, the civil government has the right to restrain it. The precise advance made by the modern over the ancient way of dealing with religions seems to be this. The ancient tolerance—a tolerance found equally, as Sir Alfred Lyall has pointed out, in European antiquity and in those parts of Asia that have not come under the yoke of the Mohammedan or Christian theocracy—always sought to combine with political unity some kind of religious syncretism. The worshippers of different deities were not allowed to contradict one another explicitly.

This restriction of ancient tolerance was the source of difficulties with the Jews and the Christians. It was, of course, maintained for the sake of internal peace. Among polytheists the peace was not very difficult to preserve in this way, since they had no disposition to contest the existence of each other's divinities; and those who ascribed conflicting attributes to the same divinity did not live side by side. When sects arose that claimed to have exclusive possession of the truth and contradicted all others, the conditions were altered. These were the conditions that appeared again at the Reformation after the long episode of intolerant unity. The sects now had sharply defined doctrines, like philosophic schools, and at the same time held to them with a religious passion beyond that of ancient devotees. Yet, if they could be brought to live in peace side by side, governments had no longer a pretext for enforcing external uniformity; at least when the Catholic ideal had been given up. And the definite legal basis at length given to diversity of worship was of some advantage to freedom of individual thought, opposed as this was equally to the Catholic tradition in which uniformity of worship now had its roots. The really important thing since has been to get rid of the idea that mere toleration of creeds held in common by numbers is an equivalent for intellectual liberty in the higher sense.

It would be interesting to determine how far the struggles of religious sects have promoted modern freedom generally. That they have done so to a considerable extent seems undeniable. The new theocracies which Calvin and the Puritans tried to set up were doubtless serpents from the blood of the "stranger and more horrible Medusa" of Bruno's allegory.¹ Yet, without the severing of Catholic unity, independent national States would have been much more difficult to maintain; and without the aid of the personal religious feeling that could not, after all, be kept within the limits of the new ecclesiastical bodies, political freedom would not so soon have been won. All that we have to bear in mind is that freedom,

¹ *Opere di Giordano Bruno*, Ed. Wagner, ii. 191.

in the full sense, is the true end of the whole movement, the "form" of the spiritual unity at which we ought to aim. Religious Protestantism, therefore, must be looked upon as a means rather than as any part of the end. As a means it was probably indispensable.

CHAPTER IV.

RESULT.

THE general result of the foregoing outline seems to me to be that the return of Europe to light has much more the character of an intrinsic process than the descent into the dark ages. The causes of both transitions are discoverable. In the first, an extrinsic cause gives its character to the movement, whereas in the second the movement is correctly described as a return. There is no sufficient reason for thinking that Greek civilisation had arisen otherwise than as an ascent, unchecked by any great obstacle, from a barbaric state, such as persisted in the northern parts of Europe. The elements of culture derived from Egypt and the East were borrowed, not inherited. Greek civilisation in essentials was indigenous. In quality it reached its highest point during the great age of Athenian history. Thenceforward, along with the enormous expansion that issued at last in what we call the Græco-Roman civilisation, there was a decline in quality. This was clearly perceived by the ancients themselves. The first stage of the decline ended in loss of all the political freedom there was in the civilised world by transformation of the Roman Republic into the Empire; the second, in loss of intellectual freedom by the adoption of Christianity as the religion of the State. The influx of the barbarians brought the destructive process to a conclusion; but it was at the same time one chief source of the later regeneration. The other chief source was the constantly renewed effort to return to older thoughts. It was in vain that the Church tried to reduce the study of ancient literature and philosophy to a merely formal and grammatical

training. In Italy, above all, the new domination did not efface the sense that there had been a freer and greater political past. And, as the political tradition could be traced back to ancient Rome, so the intellectual tradition could be traced back to Athens.¹ While the movement of descent had been essentially Orientalising, the movement of re-ascent was a renewal of forms of life and thought native to the West. The science and philosophy that came from the Arabians was mainly Hellenic science and philosophy transmitted through a series of translations. The humanistic movement was a further stage of the same process. After this, modern science takes a development beyond anything known in antiquity; but it still has its roots there. And if this is true even of the physical sciences, it is still more true of the sciences of human nature.

The decline in later antiquity was, of course, not purely a decline. Advances of detail were made both in science and philosophy. Through the mixture of nationalities, ethics took a cosmopolitan tone, which in part compensated for exclusion of the more æsthetically disinterested elements that had found a place in the systems of those who theorised before the life of the city had lost its independence. And the decline itself and the destruction of ancient life in its typical form were no doubt indispensable stages in a process that was to give greater extension to its ideal. For it was precisely the highest expression of the life of earlier antiquity that could not be extended by the cosmopolitan mixture that was going on. Ancient freedom was essentially limited to the city. Thus it came about that the defenders of freedom were, after a rather early stage, for the most part conservatives. The prevailing movement did not consist in the extension of freedom, because no way of extending it was then visible. Other kinds of diffusion of the Hellenic spirit were possible, but not this. In what has been called the Orientalising pro-

¹ "La villa,
Del cui nome fra i Dei fu tanta lite,
Ed onde ogni scienza distavilla."

DANTE, *Purgatorio*, xv. 97-99.

cess, some of the men of greatest genius took part. According to an opinion that has often found utterance, Plato's practical ideal, for example, was essentially of the Orientalising type. Particular features in his ideal State were derived from Greek cities; but it is Oriental in spirit, and is in some respects an anticipation of the hierarchy of the Middle Age. At the same time, Plato has a critical side; and in Greek life his criticism was of the nature of a dissolvent. Thus may be explained, apart from metaphysical preferences, the attraction he has exercised on minds of opposite types. Minds of one class have seen in him the revolutionary critic, who in later life fell off from his own spirit of free inquiry; minds of another class, the precursor of a more authoritative system of religion and society, who was by accident a dialectician. A similar explanation would render intelligible many other sympathies and antipathies displayed by students of the practical as well as intellectual struggles of antiquity. The comment that suggests itself is, that we ought at least to do full justice to those who, at any time, defended the political or intellectual freedom that remained in the world. An Athenian or Roman patriot, or even a philosophic emperor, could not be expected to foresee and prepare for a period thousands of years distant, when, after enormous changes, the destruction of what was best in the world he knew, would have led to the possibility of something better.

The Hellenising movement in the Middle Age, which is the counterpart of the Orientalising movement in antiquity, was, as is known, partly brought into the service of the power that was then dominant. If it had been able to get free at the start, we should probably date the beginning of modern civilisation from the twelfth or thirteenth instead of from the fifteenth or sixteenth century. That which gives its character to the typical civilisation of the Middle Age is the reduction of the arts, of science and of philosophy under the form of the dominant religious ideal. In themselves, however, the elements of civilisation on its intellectual as well as on its political side, were not only something apart from the religious tradition, but were understood to be so. The religious tradition was quite

clearly conceived as having its origin in the Jewish Church. The idea of "progress" that some students find in this conception is one thing; ideas of progress in the arts and sciences are quite another. These, when they appear—or, rather, reappear, for they were not unfamiliar to the ancients, are accompanied by the idea of a break in history—a destruction and a new growth.

The decisive contest between the two ideals—the ideal of ancient or modern Europe and the ideal of the Middle Ages or the East—concerns less the "matter" than the "form" of the final view of life and structure of society. To desire a return to classical antiquity that should exclude all new material elements, ethical and other, would be in more than name reactionary. The essential question, in ethics for example, is whether the supreme rule of life shall be a supernatural code from which deductions are to be made, or regard to the good of the whole, guided by reflection upon human experience. The question whether, in the working out of a system, Hellenic or Hebraic elements of thought or feeling shall preponderate, is subsidiary, and can only be determined when the principle is fixed. Perhaps this is in part a question of personal preference. A strictly philosophical system of ethics, worked out in complete independence of any supposed revelation, might, according to the individual temperament of the philosopher, take one or the other complexion with respect to its material elements. When a Father of the Church calls the virtues of the heathen "splendid vices," this indicates temperament, and is not a simple consequence even of the theological system. The retort might be made by men of another type, that the holiness of the Christian saint is "an exquisite malady;" but the better way seems to be to admit, as some have done, that there may be disparate types of moral excellence, each equally admirable in its kind. In both cases they are, in their perfection, results of nature, and not of system. Reconciliation need not be despaired of where details are concerned. The only point where there can be no reconciliation is whether "the light of nature," in its form of human reason or experience, or both, shall be a mere introduction to a

higher point of view given by "supernatural" light, or shall be the supreme judge of all ethical commands from whatever source they are said to proceed—whether, in short, ethics, as a system and on principle, shall be theological or philosophical.

It may be allowed that as yet there is no philosophical system of ethics that can be as much to the modern world as Stoicism, for example, was to later antiquity. For one thing, the ground will have to be cleared more completely of pre-existing systems before this can be hoped for. A social atmosphere of free reflection on ethical questions, and a general sense that the rule of life is to be seriously determined by philosophy, appear to be necessary conditions. Yet there is a promise of compensation if the modern intellectual movement, in spite of all temporary depressions, is steadily ascending. The ethical spirit of the great age of Greek life did not find its expression in a philosophical doctrine that was active during the period. The philosophical systems that had most practical influence were thought out when civilisation had begun to decline. Aristotle's system, which pre-supposed the free life of the city, came in at the end of the period of freedom. For this reason its influence has always been rather scientific than practical. Now, an ethical system fully elaborated during our present phase of still unorganised material progress, if it really answered the needs of the time, could scarcely be acceptable permanently. It would be too strongly coloured by its relation to existing industrialism, whether that relation was sympathetic or hostile, and would not at a later date have the advantage of presenting scientifically an ideal social type. Thus any surviving influence from a powerful system of to-day would only prolong a phase that has already lasted long enough. Perhaps the working out of an ethical system identical in spirit with the life of the best age of civilisation, and active in that age, is reserved for the future of the modern world.

“MIND-STUFF” FROM THE HISTORICAL
POINT OF VIEW.

“ALL things the world which fill of but one stuff are spun.” Out of that stuff, minds also are formed; and, in its inner reality, it is itself of the nature of mind. This is essentially the metaphysical doctrine set forth by Clifford in his essay “On the Nature of Things-in-themselves.”^{*} “Mind-stuff” is not, as some critics have supposed, “a substance combining physical and psychical properties.” Matter, according to Clifford, is purely a phenomenon. The external world is a kind of “dream” of each of us. Our dreams of this kind resemble one another in certain respects; hence we are able to use a common language about them. Corresponding to the “dream,” or phenomenon, is an inner reality. In our own minds we know a portion of this reality. The reality of the individual mind corresponds to the phenomenon we call the body. To animal bodies correspond minds more or less resembling ours. To inorganic things correspond elements of “mind-stuff” not ordered in such a way as to enter into a consciousness. Consciousness depends on the assumption of form by elements of mind-stuff; and, though all elements of mind-stuff have the possibility of assuming the form of consciousness, not all have actually attained that form. The entirely unformed elements, though in themselves of mental nature, must be called unconscious.

This doctrine of Mind-stuff, as Clifford himself held, is one to which speculation has been tending for some time. Regarded from the historical point of view, it appears as the final expression of a metaphysical doctrine which has been developed

^{*} Included in *Lectures and Essays*.

under the influence of science. Yet, unlike some theories that are scientific in their origin, it can maintain itself against philosophical scepticism. For, in seeking to give a metaphysical meaning to the newer results of physical and psychological science, it takes idealism as its presupposition. It has, accordingly, strong claims on the attention of those who desire to arrive at a consistent view of things, and who regard a metaphysical doctrine as the end to which scientific research is only a means.

I.

The disciples of Kant and Hegel are fond of remarking that since the time of Hume those who belong to the same school of thought as Hume and his predecessors have given up all attempt at pure philosophy, and have confined themselves to psychology and the classification of the sciences. But, they say, the result of Hume's philosophy was not a result that ought to have been taken as final. It was only by concessions to "common-sense" that the philosophy of Hume could be made to seem as if it left room for science. Philosophers ought to have attempted a new construction which should be proof against scepticism, and not to have given up metaphysics as impossible; for a metaphysical doctrine is necessary as a basis even for physical science, and empirical psychology is not sufficient as a substitute for metaphysics. The reply that is usually made by the modern empirical school is, that the philosophy of those who declared experience to be the only source of knowledge was incomplete till the true way of meeting the difficulties pointed out by Kant had been suggested by the theory of Evolution. This answer is to a certain extent satisfactory, but that it is not entirely so is shown by the fact that those who have seen the importance of the theory of Evolution in psychology have not found idealism or scepticism sufficient as a metaphysical doctrine. The "transfigured realism" of Spencer and the "reasoned realism" of Lewes, for example, have been put forth in opposition to idealism and scepticism. But neither of these views has been generally accepted by

those who are disposed to accept as a whole the system of philosophy founded on Evolution. "Transfigured realism" and "reasoned realism" are not able to maintain themselves against idealistic and sceptical criticism, and therefore many admirers of the philosophers who advocate these theories are content to go without a metaphysical doctrine altogether. On the other hand, the Hegelians say they have a system which contains in itself an answer to all scepticism as to the possibility of metaphysics. But their system has not had its form determined by scientific method, and consequently does not serve to explain the generalisations of science, but seems something quite apart from them. For this reason Hegelianism does not commend itself to those who wish to see unity introduced among the conceptions of modern science. Now if it can be shown that the theory of "mind-stuff," while it is founded on a scientific view of things like the theories of "transfigured realism" and "reasoned realism," at the same time does not make any attempt to escape from the necessity that is imposed on modern metaphysics of giving up all pretence of restoring the forms of ontology that were destroyed by Hume and Berkeley, then something will have been done towards proving that the system of Hegel was a premature attempt at reconstruction in metaphysics, and that the only way to arrive at a new point of view capable of superseding dualism was to study psychology and physical science for the sake of their suggestions, until a sufficient number of suggestions for a general theory of knowledge had been accumulated to make it possible to select from them those that are appropriate.

Up to the present time it has not been noticed that Clifford's theory reduced to its simplest form is identical with Schopenhauer's metaphysics of the Will. When the two theories are compared, it is obvious that Clifford's mind-stuff made up of "elementary feelings" corresponds to Schopenhauer's "will as thing-in-itself." Schopenhauer explains that by "will" he does not mean anything like an actual volition, but a kind of fundamental feeling for which "will" is a better term than any other, since it suggests to the mind the element in actual consciousness that is most opposed to distinct cognition, and

since this is the element that must be regarded as primitive. More recently the distinction here pointed out by Schopenhauer has been expressed in Mr. Spencer's classification of states of consciousness into "feelings" and "relations between feelings." Mr. Spencer himself has suggested the theory of mind-stuff as a possible view in the chapter in his *Principles of Psychology* on the "Substance of Mind," but has not developed it. Still it is clear that his classification of states of consciousness has led to an improved statement of the theory, for the term "feeling" is less open to objection than the term "will" as the name of that which is primitive in mind.

The importance of Schopenhauer's anticipation of the theory of mind-stuff will be seen when it is considered that Schopenhauer professed to found his metaphysics on science, and that at the same time he was, like Clifford, an idealist; his idealism having however been arrived at by the study of Kant rather than of Berkeley and Hume. As to his metaphysical theory of the Will, he asserted that it was a translation into philosophical terms of the physiological doctrines of Cabanis and Bichat. According to a French critic who wrote on the subject not very long since,¹ all the characteristic doctrines of English and German physiological psychology are implicit in the works of these physiologists. Even if we admit that some of the conclusions of modern schools may have been read into the statements of the earlier writers, yet in order that such a position as that of M. Paul Janet can be taken up, there must be many things in Cabanis and Bichat capable of having suggested to Schopenhauer the ideas possessed by the modern schools of psychology. Since Clifford undoubtedly found suggestions in these ideas, the historical parallelism between his theory and Schopenhauer's is very close. Not only have both theories their origin in science, but also in the same group of scientific ideas.

The ideas that have done most to make contemporary psychology different from the psychology of the older empirical school are: (1) the distinction that has been drawn between consciousness, sub-consciousness, and unconsciousness as

¹ M. Paul Janet in the *Revue des deux Mondes*.

modes of sensibility differing only in degree, the older psychologists having taken into account only those elements of mind that emerge into full consciousness; (2) the application of the biological theory of Evolution to psychology; (3) the discovery by some German psychologists that the methods of experimental physiology may be applied to the psychology of the senses.

Schopenhauer's system was suggested by the first of these ideas. He set out with a theory of the external world held in common by himself and all idealists since Berkeley. In explaining this view he uses the terminology of Kant and distinguishes between the "representation" and the "thing-in-itself." The external world belongs to the representation and is often spoken of by Schopenhauer as "*Maya*" or illusion. Clifford makes use of the same term—representation—in setting forth the idealistic part of his theory. Sometimes the objection is made to this term that "it implies something representing and something represented." But the same answer may be given to this as to similar criticisms on Berkeley's "ideas" and Hume's "ideas and impressions." These philosophers had to explain that they used such terms merely as descriptive terms; they requested their readers to get rid as far as possible of all associations of the words "idea" and "impression" with the metaphors from which they are derived, and with physical hypotheses. The word "representation" has similar associations, and this must be borne in mind when it is employed as a philosophical term. After selecting from previous systems his metaphysics of the external world, Schopenhauer, like Clifford, put the further question, What is the nature of the thing-in-itself? and he answered it in the same way. The criticism of Hume had made it impossible to accept Berkeley's view that "the substance of mind" is the thing-in-itself; and the empirical psychology by which all consciousness is resolved into impressions and ideas derived from impressions, was not found adequate as an explanation of things, for the "impressions" of Hume are merely portions of the "representation." The problem that demanded solution was to find something having the nature of mind but deeper than definite conscious-

ness. If this could be found, and could be shown to be capable of explaining actual consciousness so far as explanation is possible, then the problem might be considered as solved.

The facts of physiology have at length led psychologists to see that the series of states of consciousness which it is possible to observe and classify by means of the introspective method alone forms only a portion of the mental life, that definite consciousness has a background of sub-consciousness and unconsciousness. At first it seems like a contradiction to speak of facts of unconsciousness as belonging to psychology; but when it is considered that the same changes in the nervous system may be accompanied according to circumstances by vivid changes in consciousness or by some sub-conscious change or may have no mental concomitant that can be detected by introspection, then it becomes evident that mind must be regarded as consisting of other elements besides those that appear in distinct consciousness; for it is absurd to suppose that the same nervous change taken by itself has different mental concomitants at different times. This conception, suggested by physiology, that mind is made up of elements which may be combined into what is called consciousness, but which, taken alone, are "unconscious," is really implied in the ordinary introspective psychology. The elements into which complex states of consciousness are resolved by analysis are not immediately perceptible in those states; the laws of association must be understood before the elements of actual consciousness can be detached; hence these elements may be called "unconscious." But the study of physiology was necessary to bring out clearly the conception of "unconscious feelings" as factors in mental phenomena. These elements of mind disclosed by physiology were regarded by Schopenhauer as the reality underlying all phenomenal existence, and the fundamental element in mind was called by him the Will. This term was selected because of the antithesis that there is between "will" and "intelligence"; intelligence—definite cognition—constitutes mind as we know it in its highest form; the term "will" is applied to what is regarded

as the irrational element in mind—that which is irrational because it is more fundamental than reason. Now if the term “unconsciousness” as applied to mind is once admitted, it is impossible to stop short of admitting that every change in the brain has a subjective aspect; from this admission it follows that every portion of the “representation” has a portion of “will” corresponding to it. Thus, according to Schopenhauer, the reality outside us is “will.” The brain is “the will objectified.” When we have that consciousness of resistance to effort which is the basis of our conception of external things, we are conscious of the presence of will as the external reality. The Representation is an illusion we construct for ourselves. It is derivative while the Will is fundamental.

Many of the ideas connected with the general conception of “unconsciousness” have acquired new importance lately, and it may be worth while to mention one or two of them for the sake of their bearing on Schopenhauer’s theory. The “muscular sense” and the “organic sense” have been known for some time, and it is partly through becoming aware of the existence of these senses that psychologists no longer believe that all the factors of mental phenomena can be discovered by introspection. Recent theories of the origin of the perception of space, that of Lotze, for example, depend on the admission that there are unconscious elements in perception derived from the muscular and organic senses. But the most interesting problem that has recently been discussed in its relation to the idea of unconsciousness is that of memory. It has now become a commonplace to say that heredity is unconscious memory. This way of describing the facts of heredity might have been suggested by the study of Mr. Herbert Spencer’s exposition of the manner in which instincts developed by mechanical processes under the action of natural selection at length by gradual complication pass into rational processes, and rational processes, after they have been repeated often enough, into secondary instincts. Now this transition from instinct to reason and from reason to secondary instinctive processes cannot be imagined on the subjective side unless it

is supposed that "consciousness" and "unconsciousness" are different merely in degree and not in kind. Thus we are brought back to Schopenhauer's theory of Will. At the same time we are led to consider this theory in its relation to the doctrine of Evolution, for the exposition in Mr. Spencer's *Psychology* that has just been referred to is closely connected with the doctrine of Evolution.

Though Schopenhauer put forth a biological theory which has some resemblance to the theory of natural selection, his philosophy was not determined in its general character by the doctrine of Evolution. This accounts for the difference between his theory of Will and Clifford's theory of Mind-stuff. Clifford had the advantage of writing when the idea of Evolution had taken distinct form, and this gives a certain superiority to the theory of Mind-stuff, a superiority which consists chiefly in the substitution of the term "feeling" for "will."

The antithesis of "will" and "intelligence" is obviously identical with that of "feelings" and "relations between feelings." The latter mode of expressing the antithesis has the advantage that it is less vague, and that its terms are not so much associated with complex phenomena of consciousness as those used by Schopenhauer. But the fundamental distinction of feelings and relations could not be expressed with perfect clearness till the idea of Evolution—of ancestral experience—had enabled Mr. Spencer to extend the method of the older empirical school of psychology. This extension of the method of the empirical school consists in a hypothetical analysis of the ultimate feelings arrived at by introspection into still simpler feelings. Such a reduction of consciousness to simpler elements than those that introspection arrives at becomes conceivable when complex organisms are thought of as evolved from simple organisms; for rudimentary sense-organs imply rudimentary sensations. The result of Mr. Spencer's analysis is that, given "elementary feelings" and relations of unlikeness or of sequence, the most complex phenomena of consciousness may be explained by assuming that gradual development has taken place. This analysis is implicit in Clifford's statement of the theory of mind-stuff, but not in Schopenhauer's.

The results of the application of the experimental method to Psychology are also implicit in Clifford's statement of his theory. Fechner and others have shown by their "psycho-physical" investigations that sensations which cannot be resolved into groups of simpler feelings by any process of introspection or analysis are made up of elements of sensation, and that it is by summation of these elements that actual sensations are produced. Results of this kind tend to confirm the hypothesis that qualitative differences of sensation depend on differences of combination of some unit of feeling which may be defined as a "shock" or a "tremor." The view that mind-stuff consists of such units was regarded by Clifford as the final form that would be taken by his theory. If the theory should take this form, it would be, as Clifford says somewhere, an "atomic theory" of mind. Since we have already an atomic theory of matter, there would thus be exact correspondence between the thing-in-itself and the representation, and a meaning could be assigned to the "proportion" formulated by Clifford at the end of his paper.¹

The theory of mind-stuff, as has already been said, is not open to the ordinary sceptical criticism of ontological theories, for it rejects as fictions both the "substance of matter" and the "substance of mind." The ambiguities of the word "cause" also disappear in the final statement of the theory of mind-stuff, just as they do in the latest form that has been taken by the logic of the sciences. The fundamental axiom of inductive logic, "the uniformity of nature," as Clifford remarks, has become "an atomic uniformity"; and it has been stated by Lewes as "the law of identity" without any introduction of the word cause.² Corresponding to this improved statement

¹ "As the physical configuration of my cerebral image of the object
is to the physical configuration of the object,
so is my perception of the object (the object regarded as complex of
my feelings)
to the thing-in-itself."

² Clifford would have introduced some qualifications, in interpreting the law of identity, which Lewes did not think necessary; but he agreed with him that the Uniformity of Nature ought to be expressed as a law of

of the law of phenomenal uniformity, a "law of identity" may be stated for things-in-themselves. All that it is necessary to assert is that units of mind-stuff exist and that they never cease to exist, though they are always forming new combinations.

II.

The arguments that are most frequently brought against the doctrine of the empirical school in general amount in effect to this—that it is an attempt to explain thought by sense, to show that the consciousness of personal identity and the consciousness of the distinction between subject and object are illusions depending on certain collocations of feelings in experience, and hence that feeling is the only reality; and that in trying to prove this position it takes for granted what ought to be explained. For, it is said, unless there is already in the simplest feeling some power of combining with other feelings, how are we to explain the first appearance of consciousness? And unless even the highest kind of self-consciousness is implicit in feeling, how is its appearance to be accounted for at all? It is the perception of the difficulties pointed out by such criticism that has made the system of Hegel seem more plausible to some than that of the English school of philosophy. Hegel and those who agree with him, finding in the psychology of the empirical school the antithesis between "thought" and "sense," observing further that the philosophers of that school give their readers the impression that it is demonstrated that all but "sense" is an illusion, and having decided that this view is inadequate, try what can be made of the opposite view that thought is identical with being, that the "thing-in-itself"—that on which all phenomenal existence depends—is "self-consciousness," that the illusion is sense and not thought, the flux of feeling and not the consciousness they say we have of unity beneath the perpetual change in things and in ourselves.

changes of collocation, and not as a law of succession of events. The untenable part of Lewes's view seems to be the deduction of his material "law of identity" from the formal law of the same name. See the review of Dr. E. Koenig's *Entwicklung des Causalproblems*, below.

The fact that this view of things has been elaborated into a system shows that there is some defect in the ordinary statement of the empirical doctrine, and it seems at first as if this difficulty were inherent in the theory of mind-stuff also. For this theory has for its psychological basis the Spencerian classification of states of consciousness into feelings and relations between feelings, which is an accurate expression of the antithesis between "sense" and "thought," just as it is of the antithesis between "will" and "intelligence." The criticism from the Hegelian point of view of all empirical psychology may therefore be applied to the theory of mind-stuff under the form of such a question as this—If in the beginning only feelings exist, if the "elementary feeling" is the thing-in-itself, how do relations between feelings come into existence?

The answer is that in the final statement of empiricism "relations" are just as fundamental as "feelings." All that afterwards becomes thought is implicit not in mere feeling, but in the primitive relations between feelings; out of the combination of elementary feelings having at first simple relations to one another, all the complexity of actual consciousness arises. Thus the self-consciousness which the Hegelians say must always be present is implicit at first as some simple relation between feelings, while the "unity" they say exists beneath superficial multiplicity is found in the stuff out of which actual consciousness is made; for this remains always identical with itself, though the forms of feeling constantly fluctuate and though no particular phase of existence is permanent.

But it may be said, if relations are as fundamental as feelings, why should the elementary feeling be called the thing-in-itself? For does not the term "thing-in-itself" mean something that exists out of relation? The reason for saying that "the elementary feeling is the thing-in-itself" may be made clear by the analogy of a mathematical limit. In passing from the higher to the lower forms of consciousness, feelings constantly become more prominent and relations less prominent, and this is true whether we arrive at the lower forms of consciousness by passing down the scale of mental evolution

or by analysis of consciousness in its higher forms; hence it is possible to approach as near as we like to the conception of pure feeling existing by itself though never actually to reach it. But, as in mathematics, we may give a name to this ideal limit and say that pure feeling is the thing-in-itself.

It is true that, proceeding in the other direction, that is, passing from the lower to the higher forms of consciousness, we may approach as near as we like to the conception of pure thought entirely independent of concrete feeling. And this is how the Hegelian doctrine of the identity of thought and being has been arrived at. Fixing their attention on those forms of consciousness that are the last result of evolution, the Hegelians observe that the element of "relation," of "thought," becomes indefinitely more prominent than that of feeling. Thus they seem to arrive at pure thought just as the empirical school seems to arrive at pure feeling as the ultimate reality. It may, accordingly, be argued that "pure thought" should be called a thing-in-itself just as much as pure feeling, for it is also an ideal limit; the difference consisting in this—that while the Hegelian conception expresses the tendency of evolution by which "form" gradually becomes more important than "matter," the conception of the elementary feeling as thing-in-itself describes the origin of consciousness in raw material in which form is implicit as some simple relation. And there would be no objection to saying that thought is identical with being as an alternative formula with the other, that the elementary feeling is the thing-in-itself, if this were not regarded as an assertion that the highest forms of consciousness have been present from the first otherwise than implicitly, that is, that there has been no real process of evolution. Unfortunately the Hegelian principle is sometimes taken in this sense, while, on the other hand, no statement of the empirical doctrine has ever been supposed to involve a denial of the existence of thought and self-consciousness.

The admission that "feelings" and "relations" are equally real thus explains the way in which philosophers of opposite schools have come to conclusions that are apparently contradictory. When we think analytically, the act of attending to

the feelings by the combination of which thought is evolved obscures the idea of the relations without which these simple feelings could not exist; and on the other hand when we try to see unity in a multitude of impressions, when we think synthetically, the act of attending to complex relations obscures the idea of the concrete feelings without which thought could not exist. In Clifford's statement of the theory of mind-stuff, this admission that relations are equally real with feelings is implied, but it is said that "the elementary feeling is the thing-in-itself," because this formula embodies the results of the analysis of the complex into the simple, while the formula "thought is identical with being" seems to imply that analysis is superfluous. But without analysis there can be no explanation of things, for in seeking an explanation of things the question what is the origin of them is the most important; its solution is a preliminary to the solution of all other questions. Clifford's formula is an expression of the ideal limit beyond which no investigation into the origin of things can pass.

III.

The theory of mind-stuff is of course metaphysics and not science, though it has been suggested by the results of the special sciences. It is impossible to verify it as a scientific hypothesis can be verified. The test of the truth of a metaphysical theory is, as Schopenhauer says, consistency, and not application to some new class of facts which it was not invented to explain—that is, not verification as it is understood in science. A metaphysical theory is an attempt to express the fundamental facts of consciousness in their most general form. When an assumption is seen to be ultimate, the question whether it is a necessary truth or a necessary illusion becomes meaningless. The only question is whether it is really fundamental. That this is so is admitted explicitly or implicitly by all schools, both those that start with the facts of feeling and those that start with the fact of self-consciousness or with some principle of reason. The acceptance or rejection of the theory

of mind-stuff then ought to depend on whether it really expresses in their simplest form the fundamental facts—or the fundamental illusions—of consciousness. Now its only assumptions are these—that there is real existence external to ourselves, and that "nature is uniform." In Clifford's statement of the theory, the first of these is reduced to its simplest form as the assumption of "ejects," that is, mind and portions of mind-stuff external to the individual mind; the complications of material and mental substance are got rid of. The assumption of uniformity is also made as simple as possible; it becomes the law of "the identity of cause and effect," the assertion that what exists will continue to exist, a law which is equivalent on the subjective side to Schopenhauer's proposition that "will" is essentially "the will to live."

When the theory of mind-stuff is stated in this way it looks something like a return to the belief held by those who first began to speculate on the causes of things, that external objects have a kind of life. This has been urged as an argument against Schopenhauer's system. It is said that his "metaphysics of the will" is merely an attempt to make the illusion that resistance is a form of volition the foundation of a philosophical system. The reply to this objection is now obvious. The feeling of resistance is the feeling which is fundamental in all our perceptions, and when an illusion is universal it is impossible to distinguish it from an ultimate truth. What is called the "illusion" of the identity of resistance with feeling is fundamental, and is merely the most general form of the assumption of "ejects"; it is therefore impossible to escape from it. But, after all, it may be said, this theory of Schopenhauer and Clifford is the consequence of a return to the speculative attitude appropriate to the primitive ages of philosophy, and such a return seems an anachronism. Some considerations to which this objection leads will show that, on the contrary, the theory in question belongs really to the last stage of philosophical evolution that can at present be imagined.

According to Schopenhauer's celebrated theory of æsthetics, the earliest attitude of the human mind towards all that surrounds it is the "subjective" attitude. At a later period

there is disinterested contemplation of external things without reference to their power of causing pleasure or pain in the spectator. The attitude of disinterested contemplation is the "objective" attitude, and it is not till this has become possible that there can be appreciation of works of art. It is evident that a similar account might be given of the growth of science. It might be said that setting out from the "subjective" stage of thought and feeling in which things are regarded merely as useful or hurtful, pleasant or painful, we may reach the "objective" stage in two ways: that on the scientific side we at length attain to the conception of observation and experiment as a means of learning the causes of things, just as on the æsthetic side we attain by disinterested contemplation to the conception of the beautiful. Now the argument against Schopenhauer's metaphysics quoted above might have been founded on his own theory of art. It might be said that his metaphysical theory of the will is "subjective" and not "objective," and therefore belongs to the primitive stage of speculation. This shows that there is some defect either in his metaphysics of the Will or in his view of æsthetic development. It will be found that the defect is in his view of æsthetic development, which is true as far as it goes but incomplete. For there is a third stage of art (and also of scientific thought) which may be called "subjective," though it is in reality most remote from the subjectivity that Schopenhauer seems to have regarded as typical.

The "subjectivity" described by Schopenhauer is found in those speculations that had their origin in the period before science and poetry were completely differentiated. In mythologies, for example, an attempt is made to explain the causes of things, and at the same time things are regarded chiefly in their relation to the welfare of men. This period may therefore be called in a sense the period of the subjective stage of speculation. But the speculations of this early period seem to be subjective in character because the objective and subjective points of view have not yet been distinguished. The stage of speculation that is distinctively subjective comes last. Before it is arrived at an attempt

is made in the various sciences to look at things entirely as portions of the object-world. Afterwards the introspective point of view is reached; it is seen that to think we can have a purely objective conception of things is to be under the influence of an illusion; we learn that all phenomena are phenomena of some consciousness. The introspective point of view is that which is distinctively subjective, and it is undoubtedly the last to be attained, as is shown, when we refer to the history of modern speculation, by the fact that Hume and Berkeley came after Bacon and Descartes. But though this subjective stage of speculation is the most remote from that of the primitive thinkers who made mythologies, it has a superficial resemblance to it, for in metaphysics and psychology as distinguished from physical science and cosmical speculation there is the element of self-consciousness, and the introspective method looks at first very much like the habit of seeing things merely as they affect the emotions.

Returning to Schopenhauer's theory of æsthetics, by which this view of the evolution of scientific thought was suggested, it remains to show that there is, as has been said, a final stage of the evolution of the æsthetic sense corresponding to the introspective stage of the evolution of the speculative faculty.

This final stage of æsthetic evolution is seen best in the case of poetry. One feature of the most characteristic modern poetry—that is, lyric poetry—is its subjectivity; and there is a certain resemblance between this subjectivity and that of the early ages, though they are really extremes having between them the "objectivity" described by Schopenhauer. Sometimes in reading lyric verse the impression is produced that the poet is expressing directly and simply and spontaneously the emotion that is present to him; but it is known that this is an illusion. Elaboration of rhythm, careful selection of epithets, the intention to produce a definite effect that has been distinctly conceived beforehand, are recognised by criticism as essential to a lyric poem of the highest kind. Yet the result of all this is to give lyric poetry a superficial resemblance to those kinds of primitive poetry in which there is really direct

and simple and spontaneous expression of the emotions. The difference is that early poetry is a product of emotion which has not been analysed, that is, of crude subjectivity, while modern poetry of the most typical kind is a product of self-consciousness, that is, of developed subjectivity. A process of analysis is necessary to bring into distinct consciousness the real effect of things on the mind, and it is the characteristic of the highest kinds of art to describe the effects of things rather than the things themselves. Thus it happens that expressions which seem the most direct are often the most artificial, and that poetry which seems the most passionate is often the most intellectualised.

This passage from the crude subjectivity of the early ages to the self-consciousness of the later ages is seen on the imaginative side of poetry as well as on its emotional side. One of the critics of Shelley has remarked that the images called up by some of his lyrics remind us of the sun-myths and dawn-myths of the primitive Aryans. To put it generally, there is a return in modern poetry from complex descriptions to simplicity of imagery. And this is one aspect of the change from the "objective" attitude which has substituted itself for the primitive mode of regarding nature to that of self-consciousness; for the simplicity of the early myths is the simplicity of vagueness, while that of the modern poetry that seems to resemble these myths in the character of its imagery is the simplicity of abstraction.

The apparent return to simplicity that is noticed in modern poetry may be observed in its form as well as in its imagery and its emotional basis. But the laws of lyric verse are, in reality, more complex than those of the "objective" poetry that attempts to describe nature and human life from the outside. The simplicity of the lyric is therefore artificial, and is distinguished by this character from the simplicity of the ballad for example. The same character of artificial simplicity is seen in the products of other arts when they reach their final stage as well as in the art of expression in verse; but it is sufficient to have illustrated from literature in its highest form as poetry the view that has been taken of the development of

the æsthetic sense, literature being the art in which the greatest number of conditions are fulfilled.

A transition similar to that which we observe in passing from the earliest to the latest results of speculation and of art, may be seen in the growth of society also. More than one political theorist has found it necessary to suppose a transition from the anarchy of early ages through a period of authority, of law, of complex regulation, to a state of freedom. Perfect freedom, of course, only exists as an ideal limit, but a state of perfect freedom is conceivable in which law has disappeared except so far as it has become organic in the individual, and the description of such a state has a superficial resemblance to a description of "the state of nature."

All this goes to show that the apparent resemblance of the theory of Mind-stuff to the half-poetical, half-philosophical views of early speculators must be regarded as an argument in its favour, since this resemblance is a proof that the theory belongs to the last stage of thought that can at present be imagined. The early speculators had really the advantage of not being too much oppressed with the material of thought, and were therefore able to give a sort of answer to the most general questions that can present themselves. But the answers they gave did not satisfy those who afterwards studied nature in its complexity as a group of objective phenomena. It was necessary that the results of scientific investigation should become organic in thought before such problems as that of the thing-in-itself could present themselves clearly. In the meantime there was a movement away from metaphysics. Then at length it became possible to think out from the point of view of self-consciousness a theory that should be really metaphysical and not an attempt to substitute science for metaphysics, but in which at the same time the results of scientific study should be implicit. Clifford's theory has the characters just described; and it has also the character that belongs to every final intellectual product, of appearing perfectly simple when it has once taken distinct form.

GIORDANO BRUNO.

THE interest excited by the personality of Giordano Bruno must always have prevented his name from being quite forgotten. For above two centuries after his death, however, his writings were scarcely at all known. It was not until 1830 that the Italian works were collected, and no complete edition of the Latin works exists even now.¹ Within the present century not only have the events of Bruno's life formed the subject of more than one investigation, but his philosophy also has attracted new attention. This renewed interest in Bruno may be ascribed in part, but not wholly, to the historical spirit of the age. The study of his works, besides confirming the impression which his intellectual power and philosophical genius produced at first throughout Europe, and which has perpetuated itself in the history of philosophy, will in the end make it clear that his ideas have still a direct bearing on thought.

Recent biographical investigations have added much to our knowledge of the life of Bruno. The materials for his biography were till lately, besides the letter of Scioppius written from Rome on the 17th of February, 1600 (the day when Bruno was burned in the Campo di Fiora), chiefly the occasional references to events of his life that are to be found in his works. All that could be known at the time was embodied by Bartholmæss in the first volume of his monograph on Bruno, published in 1846. Since then, documents have been discovered at Venice, containing the records of his examination by the Inquisition there, and have been published

¹ This was written in 1884. The Latin works have since been collected, but I have not had an opportunity of seeing the complete edition.

along with a new biography by Prof. Berti (1868). The same writer has published more recently (1880) copies with which he had been furnished of the Protocols of the Inquisition at Rome relating to the last year of Bruno's imprisonment. These were obtained by a research in the archives of the Vatican which the Roman revolution of 1848 made it possible to begin but not to finish. The principal facts that have been established by these and other documents are given by Prof. Sigwart in an essay included in his *Kleine Schriften* (1881).

The exact year of Bruno's birth was fixed for the first time by the Venetian documents. He was born in 1548 at Nola in the kingdom of Naples, then under Spanish rule. His baptismal name was Filippo. The name of Giordano was assumed by him when he became a monk of the Dominican order at Naples. His noviciate began in 1562 or 1563. He received full orders in 1572. In 1576 he ceased to wear the Dominican habit. He had already been accused of heresy during his noviciate. He was now charged with holding heretical views on the Trinity. To avoid this charge he fled to Rome. At Rome the charge against him was to have been proceeded with; but he was informed of this, and escaped to Genoa. After residing for a short time in various cities of the north, he at length decided to leave Italy. He went first to Geneva, where there were many Italian exiles; but finding that to live there it would be necessary for him to profess Calvinism, he left Geneva after a residence of about five months. In 1579 began his two years' residence at Toulouse. At the University of Toulouse he obtained the degree of doctor, and was appointed to an ordinary professorship of philosophy. In 1581 he left Toulouse for Paris. There he published several Latin works, including the *De Umbris Idearum*, besides an Italian comedy, *Il Candelaio*. He refused an ordinary professorship which was offered him at the University of Paris, because in order to hold it he would have had to attend mass. An extraordinary professorship not having this obligation attached to it was conferred on him by Henry III., to whom he had dedicated the *De Umbris Idearum*. Towards the end of 1583 he set out from France with letters from

Henry to his ambassador at the court of Queen Elizabeth, Michel de Castelnau, who received him into his house. In London he frequented the society of Sir Philip Sidney, Fulke Greville and other distinguished men. He lectured and held disputations at Oxford. During his residence in England he published the most important of his works, the Italian dialogues; of these the *Cena delle Ceneri*, *Della Causa* and *Dell' Infinito* are dedicated to Castelnau, the *Spaccio della Bestia trionfante* and the *Eroici Furori* to Sidney. In 1585 he returned to Paris, where he drew up theses against the Aristotelian physics, which were afterwards published at Wittenberg. These theses were defended by a disciple of his named Hennequin in a public disputation held on the 25th of May, 1586. Soon after this he left France for Germany. From August, 1586, to May, 1588, he resided at Wittenberg, lecturing at the University and teaching privately. In his valedictory address to the University he praised the tolerance that was practised there and the courteous manner in which he had been treated. The next place he visited was Prague. In return for the dedication of one of his books he received a subsidy from the Emperor Rudolf II., afterwards the patron of Kepler. From Prague he went to Helmstädt. He composed there the three philosophical poems, *De triplici Minimo et Mensura*, *De Monade, Numero et Figura*, and *De Immenso et Innumerabilibus*, and dedicated them to Henry Julius, Duke of Brunswick. In order to get these books printed he went to Frankfort, where he remained from June, 1590, to February, 1591. At Frankfort he received letters from a young Venetian noble named Giovanni Mocenigo, asking him to visit him at his house in Venice and instruct him in the art of memory set forth in the *De Umbris Idearum* and other books devoted to the *Ars magna* of Raymond Lully. This was the cause of Bruno's return to Italy. Before his return he spent an interval at Zürich, during which he dictated his *Summa Terminorum metaphysicorum*, first printed, with a preface by Raphael Eglinus, in 1595. After his arrival in Italy in September or October, 1591, he lived alternately at Venice and at Padua. In March, 1592, he began to reside permanently in the house of

Mocenigo. Two months later Mocenigo, constrained "by obligation of conscience and by order of his confessor," denounced him to the Inquisition as a teacher of impious doctrines. He was arrested and brought before the tribunal of the Inquisition at Venice. After his examination it was decided by the Grand Inquisitor San Severina, on the report of the tribunal, that he must be sent to Rome to be judged. The Venetian government was at first unwilling to grant his extradition, but at length yielded; and at the beginning of 1593 he was taken to Rome, where he remained in the prisons of the Inquisition till 1600. Of the first six years of this imprisonment nothing is even yet known; but we now know from the documents found in the Vatican that early in 1599, at a session of the Congregation held under the presidency of the Pope (Clement VIII.), it was decided that Bruno should be required to abjure eight heretical propositions selected from his writings and from the statements that had been submitted to the Inquisitors. Only one answer of Bruno's is recorded, and this is a declaration that he has seen no reason to change his opinions. On the 9th of February, 1600, he was condemned and delivered over to the secular power, with the usual request, "*ut quam clementissime et citra sanguinis effusionem puniretur.*" When the sentence was read to him he answered, as Scioppius says, "threateningly"—"*Majori forsan cum timore sententiam in me fertis quam ego accipiam.*" Eight days later he was burned in the presence of a multitude of people who were assembled in Rome for the Jubilee.¹

More than one passage might be quoted from Bruno's works showing that he had anticipated for himself some such fate as this. When he was interrogated by the Venetian tribunal he admitted that his doctrines were indirectly opposed to the faith. His defence was that he was not an innovator in religion, but in philosophy. He declared that he had never attached himself to any heretical sect; that, on the contrary, he preferred the religion of the Catholics to that of the Lutherans and Calvinists, because it laid more stress on good

¹ On the 9th of June, 1889, a statue to Bruno was unveiled in the Campo di Fiora.

works; and that he was willing to submit to the Church in matters of theology. This last position was, as Berti says, a traditional position adopted by Bruno from the philosophers of the Middle Ages, who had tried to obtain toleration by means of it. In several passages of his works, and not merely in his answers to the Inquisitors, he says that in matters of faith he submits to the theologians. Sometimes this submission is merely ironical; it is in part, as has been said, the traditional means of defence of philosophers against persecution; but it is also expressive of Bruno's philosophy of religion, as will be seen. If it had been possible for Catholicism to grant philosophical freedom, he would have regarded it almost as the philosophers of antiquity regarded the religion of the State. It was philosophical freedom that he claimed, not freedom to found a new religious sect. But philosophical freedom was the kind of freedom that was least of all likely to be conceded by the Catholic reaction. Only an unqualified submission would have satisfied the Church, and this Bruno was incapable of making.

A few months before Bruno's extradition by the Venetian government, Galileo had begun to lecture at Padua. As is well known, Bruno accepted the Copernican astronomy before Galileo had made his discoveries with the telescope. Kepler, who lived in Prague fifteen years later than Bruno and was acquainted with some of his works, expressed admiration for him and regret that Galileo had not made some reference to his predecessor in the advocacy of the new astronomical doctrines. The fact that Bruno has a place in the history of astronomy as well as in the history of philosophy is expressive of the change that was taking place in the direction of the enthusiasm of discovery that characterised the Renaissance. This enthusiasm had been in part transferred from the remains of classical antiquity to physical science. In Italy at least representatives of classical learning were now frequently pedants of the type satirised by Bruno in his comedy *Il Candelaio*. After he had seen the chief countries of Europe and their universities, Bruno expressed most admiration for the spirit of free intellectual activity that was already making

itself felt in the universities of Germany. He praised Luther as the liberator of the human intellect, as a new Alcides greater than the first in that with the pen instead of the club he had subdued a more dangerous and more powerful Cerberus. All that the German mind still needed, Bruno thought, was a certain emancipation from theological interests. This once attained, there was no limit to what it might accomplish.

Notwithstanding the admiration which he so often expresses for Copernicus, Bruno was of opinion that he had had too much regard for "mathematical" and too little for "physical" considerations, that he had had in view facility of calculation rather than the nature of things. In his reformed astronomy, Copernicus had retained the eighth sphere of the Ptolemaic system, the sphere which was supposed to carry round the fixed stars by its revolution. Bruno abolished the whole system of spheres and substituted for it the idea of an infinite space in which there are innumerable systems like the solar system, having the so-called fixed stars for their centres. But, however Copernicus might himself have hesitated to break the last barriers of the received cosmology, Bruno still saw in him the thinker who had set himself free from the opinions of the multitude, and had first made possible the more complete emancipation of the intellect that is the consequence of the substitution of the conception of an infinite for that of a finite universe. This new philosophical conception seemed to him to bring with it far greater good than the discovery of new continents. To Copernicus he applies in a larger sense the verses of the tragedian Seneca—often in that age quoted as a prophecy—about a Tiphys who is to remove all terrestrial bounds to knowledge. Those who have discovered new continents, he says, have found out the way to disturb the peace of nations, to multiply vices, to propagate tyrannies, while the new philosophy, on the other hand, liberates the mind from chimeras and shows it how to ascend to the stars.

Though Bruno satirised the humanists as "pedagogues" and "pedants," he had himself much classical learning. He had studied with special interest the records of the teachings

of the pre-Socratic philosophers. He was of opinion that Pythagoras and other early speculators had had a truer view of the universe than that which had triumphed through the authority of Aristotle. This earlier and truer philosophy he claimed to have revived.

Another branch of learning to which Bruno had given special attention was the study of mythology; not only the mythology of the Greeks but also that of the Egyptians and of the ancient nations of the East so far as knowledge of it was accessible to him. He had, as Bartholmèss points out, the idea of a science of comparative mythology.

The polemic of Bruno against Aristotle is chiefly directed against his cosmology. His pre-eminence in rhetoric, in politics, in logic, he acknowledges; and he often quotes his opinions with approval even in physics and in metaphysics; though here he accuses him of misrepresenting the opinions of the earlier philosophers who were superior to him. In opposing the established cosmological system, he brings against those who appeal to authority the argument that the modern is really older than the ancient world. Much as he had been influenced by the Platonists of his own and the preceding age, as well as by the Alexandrian Neo-Platonists, he was not himself properly a Platonist any more than he was an Aristotelian. That Plato was more acceptable than Aristotle to Bruno and other philosophic thinkers of the time is in great part due to his never having been constituted the official philosopher of Church and School.

Bruno's principal aversions were the official representatives of Scholasticism and the humanistic "pedants," with the theological zealots of all kinds; but, above all, the Reformers of Calvin's following. His antipathy to the humanists is explicable by a certain contempt he often expresses for knowledge that is merely "instrumental." So far as philosophy was concerned, Humanism had for the time done its work. To bestow the very wide familiarity with the matter of the classics which we see in Bruno himself, for example, minute philological studies were no longer necessary. In Bruno's hostility to Scholasticism there was nothing accidental.

To the whole method and doctrine of the School his way of thinking was fundamentally opposed. Along with Jewish and Christian theologians, it is worthy of note, Bruno attacks the philosophical Pyrrhonists. The alliance between philosophical Pyrrhonism and theological faith, was not even then altogether unheard of.

A more directly metaphysical impulse was received by Bruno from Nicholas of Cusa than from any other modern thinker. Cusa has been described as the first German who, in the fifteenth century, attached himself to the study of Grecian antiquity. He was known as a reformer within the limits of Catholicism, took part in the Council of Basel, and was made a Cardinal. In cast of philosophical thought he belongs wholly to the transition-period, and not to the later Scholasticism. The most important idea that Bruno derived from him was that of "the coincidence of contraries." He thought that "the divine Cusanus," as he sometimes calls him, would have been still greater as a philosopher if he had not been restricted through his position in the Church; for the Cardinal had tried to reconcile his philosophical system with the dogmas of Catholicism.

Bruno ascribed some of the ideas of the Cardinal of Cusa to the influence of Raymond Lully (1235-1315), famous in tradition as an alchemist. Lully was the author of a system of logic by which the Mohammedans were to be converted to Christianity. His disciples maintained that his logical system was a means of discovering all truth. It is worthy of remark that he had not subordinated philosophy to theology; the doctrines of Catholic theology were to emerge as the result of a logical process. Bruno made additions to Lully's system, and during the whole period of his philosophical activity spent much time in writing expositions of it and in teaching it both publicly and privately. That which attracted him in it was probably the conception of the unity of knowledge, expressed in the doctrine that the mind may pass from any one idea to any other idea. No relation except this very general one can be traced between the logical and mnemonic art of Lully and Bruno's own philosophical doctrines.

If the exposition of the mnemonic art in the *De Umbris Idearum* may be taken as an example, Bruno's treatment of the details of the system founded by him on that of Lully is extremely obscure.¹ Passages in his Latin poems are affected with an obscurity similar to that of the "Lullian jargon," but this occasional obscurity does not affect the general character of Bruno's writings. As in the *De Umbris Idearum*, the passages that are of philosophical interest are always essentially clear. And in the obscure passages themselves there is nothing of the nature of imperfect articulation. It is difficult to believe that they were intended to be understood. They are, as Berti calls them, "sibylline and unintelligible"; and as he goes on to say, they do not seem to be of any importance so far as their meaning can be conjectured.

The Italian works are free from passages of this kind, and on the whole they are of more interest and importance than the Latin works. There are, however, many passages in the Latin works that are scarcely inferior to anything in the Italian works, and an account of Bruno's philosophy would be incomplete without reference to them.

Bruno's mode of exposition, both in the Latin and in the Italian works, is literary rather than scientific. He did not, indeed, make any attempt at that elegance of Latin style which was the chief object of the "Ciceronians." And in writing Italian, he thought it absurd to reject a word merely because it had not been used by any classical Italian author. On the other hand, he did not make for himself a rigid terminology. He says expressly, in the introduction to the earliest of his works, that he does not refuse to make use of the terminology of any school, if only it is that by which he can best convey his idea;² and in his latest work he protests against the rigid method of interpreting philosophical terms practised by the "Grammarians."³ In order to convey his metaphysical ideas in an imaginative form, he uses quite freely both the poetical and the philosophical conceptions he has met with in his

¹ For a full account of the Lullian works the reader must be referred to Bartholmæss.

² *De Umbris Idearum*, ed. Tugini, pp. 20-3.

³ *Summa Terminorum metaphysicorum*, ed. Gfrörer, p. 455.

reading. He takes pleasure in paradoxes, in ingenious combinations of ideas, so far as they help to bring out more clearly his own thought. He does not attempt to construct a system of which every detail shall be logically connected with all the rest; but his thought is none the less genuinely organic. And the vivid colouring that is given to his expositions by the use of illustrations from all sources only makes more evident the originality of his philosophy as a whole.

Bruno's essential originality is in philosophy in the strict sense of the term. He had, however, as has been seen, given special attention to physical science. Some of the scientific speculations that are met with incidentally in his works are interesting as anticipations of modern ideas. He would probably not have laid much stress on them as parts of his contribution to thought; for just as learning was to him material for the expression of his metaphysical ideas, so science was a means of arriving at a true philosophical conception of nature. In order to illustrate his mode of thought in dealing with properly scientific questions, his theory of the causes of the present distribution of life on the earth may be referred to.

He holds that the earth, under the influence of the light and heat of the sun, has the power of producing all forms of life from any part of itself, provided that the proper kinds of matter are present there. It is not necessary, he says, to suppose that all men are descended from the same ancestor; nor is each of the other races of animals descended from a common ancestor; all kinds of animals were produced in all parts of the earth. But in different places different kinds of animals have been destroyed and different kinds have remained; as in England, for example, certain kinds of wild animals have been destroyed through the cultivation of the country by men, and in other islands all men have perished through the predominance of the more powerful animals or through lack of food.¹

The mode of thinking that has since given origin to the theory of natural selection is obviously expressing itself here

¹ *De Immenso*, vii., c. 18.

under the limitations imposed by the state of the sciences of life in the sixteenth century. Bruno has speculated in the same spirit on the reason of the distances maintained by the different planetary systems from one another.¹ He has himself indicated the relation of this speculation to the ancient speculations as to the survival of certain combinations of atoms. For Lucretius he had a great admiration; which he displays by using Lucretian forms in his Latin poems. He himself sometimes applies to atoms the name of "first bodies," the only solid parts of the world.

Atomic speculations, however, are subordinate in Bruno's philosophy. In the passage just referred to and in other places he distinguishes his doctrine from that of Democritus. He points out that while Democritus regarded life and mind as accidental products of certain combinations of atoms, he on the contrary regards them as equally eternal with atoms. As an expression of the doctrine he opposes to that of the Epicurean school he often quotes the lines of Virgil:—

"Principio coelum ac terras composque liquentes,
Lucentemque globum lunae, Titaniaque astra,
Spiritus intus alit, totamque infusa per artus
Mens agitat molem, et magno se corpore miscet."

The doctrine of universal animation expressed in these lines is made the philosophical basis of the theory of the origin of life described above. The power of the earth to produce all forms of life from all parts of itself is inferred from the presence of the soul of the world in the whole and in every part.

In Bruno's system God—the absolute intellect—is at once the beginning of things and the end to which they aspire according to the degree of their perfection. The divine in-

¹ *De Immenso*, v., c. 3. Anticipations somewhat similar to the foregoing (as others have pointed out) occur in Empedocles and Lucretius, but with a shade of difference in each case. Empedocles supposes the parts of organisms to arise separately, and fit combinations of parts to survive. According to Lucretius, organisms arise as wholes directly from earth, and the fittest wholes survive. Bruno, starting from a general conception like that of Lucretius, applies it to solve the problem of "geographical distribution."

telleet manifested in nature is "the soul of the world"; in the human mind it expresses itself as the desire to comprehend all things in relation to the unity from which they proceed. All particular things, so far as they are outside the divine intellect, are in truth vanity, nothingness; they have being only so far as they participate in the being of God.

It has been disputed whether this doctrine is theistic or pantheistic. Prof. Carrière, in his book on the philosophers of the Renaissance, takes the view that there is a transition in Bruno's writings from pantheism to theism; that the Italian dialogues are more pantheistic, the later Latin works more theistic. Dr. E. B. Hartung, in an exposition of Bruno's ethical ideas and of their relation to his metaphysics, admits to a certain extent the truth of this view; but, he points out, Bruno's definitions exclude the ideas of the personality of God and of His separateness from the world; since these ideas must be regarded as essential to theism, Bruno's doctrine is, strictly speaking, pantheistic. Now both these ideas are just as much excluded from Bruno's later as from his earlier works. It might even be maintained that some definitions in the later works are more distinctly pantheistic than those of the earlier works.

The ground of Carrière's view seems to be this. In the dialogues *Della Causa* and *Dell' Infinito* the unity in which all things have their origin is described as manifesting itself in nature. The other aspect of this unity, its aspect as an end which the human intellect seeks to attain, is indicated and is placed in relation with the first. In *Della Causa*, for example, it is said that the process by which nature descends to the production of things and the process by which the intellect ascends to the knowledge of them are one and the same, that both the intellect and nature proceed from unity to unity through multiplicity. But this other side of Bruno's doctrine is more obvious in the later Latin works than in these particular dialogues. These dialogues, therefore, appear more "pantheistic," in one sense of the term, and the Latin poems more "theistic." But the view that has been supposed to be characteristic of the earlier works is found in the later works

also. Here, for example, is an expression of it from the *Summa Terminorum metaphysicorum*—"Natura aut est Deus ipse, aut divina virtus in rebus ipsis manifestata." It is alluded to in the poem *De Immenso* as a doctrine that has constantly been held by the author. And the dialogues *Degli eroici Furori*, which belong to the London and not to the Frankfort period, are devoted chiefly to the expression of the other side of Bruno's doctrine. In these dialogues the aspiration of the mind towards absolute unity is described. The contemplation of this unity, Bruno remarks, is what the Peripatetics have in view when they say that the highest happiness of man consists in perfection by the speculative sciences. The opinion of Plotinus is quoted with approval to the effect that "the mind" (as distinguished from "the soul") "either is God or is in God." Thus the contrast between the earlier and the later works again disappears. The explanation of its having been supposed to exist is probably that the poems of the Frankfort period, because of the resemblance of their subject-matter to that of the two best-known Italian works, have been compared with these to the exclusion of the others. When they are compared with the Italian works generally, it is seen that the less orderly mode of exposition adopted in them has made it possible to include elements that do not receive full expression in *Della Causa* and *Dell' Infinito*, but which are more completely expressed in the *Eroici Furori* than anywhere else in Bruno's writings.

The two sides of Bruno's doctrine are brought into relation by means of the idea of perpetual transformation, of a descent of beings from unity on the one hand and an ascent towards it on the other. This idea is already present in the first of his philosophical works, *De Umbris Idearum* (1582). In this book, indeed, most of his characteristic ideas are put forward quite distinctly though without the development which they afterwards received.

The influence of Platonism is evident in the title—"Of the Shadows of Ideas." But Bruno distinguishes his own doctrine of transformation from the doctrine of emanation taught by the Neo-Platonists. As there is a continual passage from

light to darkness by which the higher beings become lower, so also, he says, there is a continual passage in the opposite direction by which the lowest beings may gradually return to the highest state. Light is here the symbol of the region of ideas, of the absolute unity which alone truly exists. Darkness is merely the negation of light; the symbol of not-being. The "Shadows of Ideas" are things in nature and thoughts in the mind. They partake of the nature of light and of darkness. Any natural thing can change its form and (within certain limits) assume any other form. Similarly the intellect can pass from any particular thought to any other thought, if it has thoughts that can serve as means between the extremes. The end that the intellect ought to propose to itself is ascent to the region of Ideas, to the knowledge of the One as distinguished from the Many, of the permanent as distinguished from forms that change. The vision of the absolute unity must be described as a state, not as a process. Since the human mind is continually disturbed by sense and imagination, this state cannot last long, and is therefore, by those who describe it, spoken of in the past rather than in the present tense.

There is a very interesting passage in the *De Umbris Idearum* on the relation of Art to Nature.¹ It is declared that "dædal Nature is the fountain of all arts." For arts proceed from the mind of man; and Nature first gave birth to man with all his faculties. Unless we turn away from her, Nature herself will be present to us in all things. Nature (or the soul of the world, or fate, or necessity, or by whatever other name we may speak of the same power) proceeds from the imperfect to the perfect, and so also does Art, which Nature leads by the hand. Thus—the art of writing being taken as an illustration—men at first wrote on the bark of trees; then succeeded the age that wrote on stone; afterwards the papyrus was used, then parchment, then paper. As there was progress in the materials so also in the instruments of writing; first the knife was used, then the stylus, and so on continually.

This idea again appears in the last book of *De Immenso et*

¹ *De Umbris Idearum*, ed. Tugini, pp. 59-64.

Innumerabilibus. Here a certain reaction from Platonism is perceptible. "Forms without matter," "light without body," are declared to be as absurd as other "separate substances," "abstract species," and "essences without being." The light that the Platonists feign outside things they are told to seek nowhere but in nature and the human mind. The reaction, however, is not from any position taken up by Bruno himself in his first work. It is merely from the use of the language of the Platonists, which expresses his doctrine inadequately so far as it gives the impression that he regards the absolute light, the region of Ideas, as entirely distinct from things. And when we come to the passages containing his doctrine of the divinity of Nature, even the expressions are seen to be almost identical in the two books, though there is an interval of nine years between them.

But the central ideas of Bruno's metaphysics are best seen in the dialogues *Della Causa, Principio et Uno* ("Of the Cause, the Principle, and the One"). "The universal intellect" is here declared to be the universal efficient cause. Many names have been given to this cause by philosophers in order to describe its mode of operation. The name that is to be preferred is that of an "internal artist"; for the universal efficient cause gives form to all things from within. The final cause which the universal intellect proposes to itself is the perfection of the world; that is, that in all parts of matter all forms shall have actual existence.

There are two principles of things, "form" and "matter." "Form" as one of the principles of things is to be distinguished from the accidental forms of things. The formal principle is in a manner identical with the efficient cause. For the soul of the world may be regarded now as cause and now as principle. In virtue of the formal principle not only the universe but all its parts are animated. Every portion of matter has its soul or "form." Not all concrete things are alive as such, but all things are alive as regards their substance. The portion of spirit that belongs to any corpuscle is capable of becoming the soul of any kind of animal by receiving the members appropriate to that kind of animal. All motion, all action,

is due to the soul or form that is in the universe and in particular things. But there could be no action if there were not something capable of being acted upon, if corresponding to the active power of shaping there were not a passive power or possibility of being shaped in all ways. Hence a second principle or substance of things, "matter," must be assumed in addition to the principle or substance of "form." These two substances are equally eternal. No portion either of material or of spiritual substance can perish. Nothing is ever annihilated except the external and accidental forms of things.

In particular things, "act" and "possibility" do not coincide. No particular thing in the universe is all that it can be. But in the absolute first Principle of things, which is all that it can be, "act" and "possibility" are the same. Spiritual and material substance, "form" and "matter," the active and the passive principle, are therefore, with respect to the whole, identical.

Matter may be considered not only as "possibility" or "potency" but also as "subject." In itself it has no extended form; it is not restricted to any one mode of being. Just as Art deals with various kinds of matter, each capable of receiving many shapes without change as to its composition, so Nature deals with a matter common to all things, both corporeal and incorporeal, both sensible and intelligible, and remaining under all changes the same in substance. This matter which is limited to no specific mode of being is identical with "pure act" and with the efficient cause. It has no particular figure or dimensions because it has them all implicitly. It is said to include all forms rather than to exclude them all, because it does not receive them as from without, but produces them from within. This truth was in part perceived by Aristotle, who makes Nature an internal and not an external principle. But instead of declaring that matter, being permanent, coincides with "act," he places actuality in his "forms" and "entelechies," which are accidental and changing, not truly substantial.

The Infinite, in which matter and form, act and possibility, coincide, contains in itself all being and all modes of being.

Each particular thing contains the whole as regards its substance, but has not all modes of being. All evil and imperfection consists in this, that particular things, striving to attain the modes of being which they do not possess, lose one mode of being in order to assume another. In the Infinite all things are one; no quality is different from its opposite; a moment is not different from a century, unity from multitude, a solid from a mathematical point.

The doctrine of the coincidence of contraries, by the help of which the unity of all things is demonstrated, has an important position in Bruno's philosophy. It is suggested to him in the first place by the logical law that "the knowledge of opposites is the same." He quotes the opinion of Heraclitus to the effect that since the One, through the mutability of things, contains in itself all forms, contradictory propositions must be true of it. But it is to Nicholas of Cusa that he ascribes the special mathematical development which he gives to this idea. The treatment of the circle may be taken as an example of his development of Cusa's doctrine. It is shown that in the circle a very small arc coincides with its chord and again that the circumference of an infinite circle coincides with a straight line. Hence, it is argued, contraries—in this case the straight line and the curve—are coincident in the maximum and the minimum. The maximum and the minimum themselves coincide in the infinite, because where act and possibility are the same everything is that which it is capable of becoming. The point, for example, by motion can become a line, the line a superficies, and the superficies a solid, and all numbers can be produced out of unity; hence unity coincides with infinite number and the point with infinite magnitude. The point and unity were regarded by Pythagoras and Plato as symbols of the one Principle of things. Pythagoras explained the production of things from the one Principle by the analogy of the production of numbers from unity, Plato by the analogy of the production of all figures by the motion of a point. Both these methods may enable the mind to rise to the contemplation of the One; but that of Pythagoras is the best, because numbers have a higher degree of abstraction than figures.

Bruno develops this Pythagorean idea in the book *De Monade, Numero et Figura*. The Monad here symbolises the absolute unity which contains in itself all being, the identity of the maximum and the minimum. The Dyad is the symbol of difference and division, of the contradictions that are found in things. The final reconciliation of all contradictions, the return to unity, is symbolised by the Triad. Other meanings are assigned to the remaining numbers up to the Decad, and to corresponding geometrical figures; but the philosophical bearing of the chapters of this book that follow the fourth (on the Triad) is not very obvious.

In *Della Causa* the one principle manifested in the universe is distinguished from the universe regarded as a manifestation of that principle. The universe or nature¹ is called the shadow or simulacrum of the principle in which act and possibility coincide. There is not absolute coincidence of act and possibility in the universe; it is indeed all that it can be "explicitly"; but its principle is all that it can be "indifferently"; in the one principle there is no distinction of parts. This view of the universe in relation to its principle is explained in more detail in the dialogues *Dell' Infinito, Universo e Mondi*. Here the universe is called an attribute of God. The infinity of God is distinguished from the infinity of the universe. God is declared to be infinitely, and totally in the whole world and in each part of it, while the infinity of the universe is totally in the whole but not in each part. The eternal existence of an infinite universe and innumerable worlds is inferred from the infinite power of God by means of the position already established that in God act and possibility coincide. If one attribute of God were finite, then, it is said, all would be finite. Those who maintain that the universe of matter and space is absolutely limited must be asked by what they suppose it to be limited. If they say by an immaterial world or principle, then it must be replied that a material and an immaterial world cannot form one continuum. Beyond the world in which we

¹ The word "Nature" as used by Bruno sometimes means the universe as a manifestation of the divinity, sometimes the divinity manifesting itself in the universe.

live nothing can exist but ethereal space and other worlds of similar composition. From the infinity of the universe of matter and space it follows that it can be acted upon by no cause external to itself.

In this way Bruno connects his metaphysics with the cosmology which he substitutes for that of the Peripatetics. At the same time he attacks the Aristotelian physics and the Ptolemaic astronomy on scientific grounds. The hypotheses of mathematicians have, he says, been put in place of reality. But nature ought to be a law to reason, not reason to nature. To those who appeal to the evidence of the senses in favour of the received opinions, he says that it is really from "an imbecility of the reason" that these opinions proceed, and not from the senses. The senses do not deceive; truth and falsehood are in propositions, not in the elements that sense supplies to reason. Sense itself, rightly considered, corrects the errors of sense and suggests the notion of an infinite universe; for we have experience of the illusory character of limits such as the visible horizon, and of the appearances of things at a distance. The hypothesis of an eighth sphere containing all the fixed stars is compared to the opinion of one who, being surrounded by trees, should think the seven nearest to be unequally and all the rest equally distant from him because they appear so. The repugnancy of the Peripatetic doctrine of the motion of the heavenly bodies in perfect circles to all that is observed of nature is frequently dwelt on. According to Bruno, though all natural processes are in a sense circular, nothing ever returns precisely to its former state. He ridicules the fancy of "the Platonic year," regarding it as a kind of symbol of the opinion that mathematical exactness is observed by nature. No mathematical circle exists in nature, any more than a mathematical point or straight line. Each of the planets has one motion which may be resolved into a number of approximately circular motions, but which is itself neither motion in a circle nor in any combination of circles. The heavenly bodies move freely in infinite space; they are not carried round by spheres. And with the system of the planetary and other spheres the concentric arrangement of the four elements

disappears also. In opposition to the Aristotelian doctrine, Bruno argues that the elements have no fixed order of position with respect to one another. They are, besides, never found in nature pure or unmixed. All substances in nature are mixed, and their composition is perpetually changing.

There is no fifth element or "quintessence." The stars and planets are not simple bodies, but are of mixed composition like the earth. All the bodies in the universe are made of the same elements or proximate principles as well as of the same primordial matter. In the sun and the stars fire predominates: in the earth and the planets (in which class the comets are included) water predominates. Bodies of the first class shine with their own light, bodies of the second class with a reflected light. But the element of fire is not absent from the earth. And water, being, as Thales taught,¹ the basis of all substances, the common element that binds together the parts of the elements of earth and air, cannot be absent from the sun. Heat and light, besides, are not sensible in themselves. Light, for example, is itself invisible; it is visible only by means of the body in which it inheres. What we call flame or fire is light or heat inherent in a moist body. Hence the sun is not without opacity and coldness as the earth is not without heat and light. The name of "ether" is given by Bruno not to the "quintessence" of which the stars were supposed to be made, but to space as distinguished from matter. The "immense ethereal space" of his cosmology he identifies with the "vacuum" of the Epicureans. Of this vacuum he says, "God is the fulness." The "ether," or "heaven," or "space," as distinguished from the bodies it contains, is ingenerable, incorruptible and immovable. Being infinite it has properly no figure; but we may describe it, following Xenophanes, by the similitude of a sphere, the centre of which is everywhere and the circumference nowhere.

¹ Bruno ascribes this doctrine not only to Thales, but also to "Moses and the Babylonians." Water, being an element in which coldness and darkness predominate, is, he argues, the representative of matter in the Mosaic and Babylonian cosmogonies; light or fire, of spirit. He himself often makes the sun the symbol of spirit or form or the active principle in nature; the earth, of matter or the passive principle.

Since every point of space may in turn be regarded as the centre, all motions may be said to be up or down, towards the centre or towards the circumference, according to the point with respect to which they are considered. There is no difference of up and down, central and circumferential, with respect to the infinite universe. Moving bodies may be called light or heavy according as they are in motion to or from any particular point. There is no absolute difference of "gravity" and "levity," as there is no absolute difference of central and circumferential positions. Bodies on the earth are said to have gravity with respect to the earth, because it is the system of which they are parts. The parts of the earth are related to the centre of the earth as the parts of an animal are related to the organic centre of that animal. If any part of the earth be removed to a great distance from the centre, it will not tend to return to its own place with a force proportional to its distance from that place (as the Peripatetics are obliged to maintain), any more than a part of an animal, being removed, will tend to return to its place. When it is at an indefinite distance from the system of which it has formed part, a body has no tendency to return to that system; for it is now neither light nor heavy with respect to it. Its motion will be determined by the general law that all bodies seek "the place of their preservation." When a body is in "its own place," that is, the place of its preservation, it is again neither light nor heavy.

Neither the material nor the spiritual substance of things seeks to preserve itself or fears to be destroyed, for substance is eternal. But all particular things, being subject to vicissitude, are moved by the desire to preserve themselves in their present state of being (*il desiderio di conservarsi nell' esser presente*). Contraries are found together in nature, and the desire of self-preservation expresses itself in general as love of that which is similar and hate of that which is dissimilar. But things may seek that which is unlike them in kind, instead of fleeing from it, if it tends to their preservation. The motion of the earth, which is called circular to distinguish it from the rectilinear motion of the parts of the earth (though

not one of the four motions of which the earth's total motion is composed is in a perfect circle), is determined by the need which the earth has of the light and heat of the sun. Not only is the earth the source of life to the animals on its surface; it is itself an animal. The sun and all planets and stars in the universe are also animals, which, like the earth, though divine and perhaps not destined to perish, are yet generable and corruptible. They differ from the animals on their surface in that they have all the substance that is necessary for their preservation in themselves, and have not to seek it outside; but they resemble them in this, that they too preserve their life by retaining a certain constancy of form during all changes of the position of their parts. In order that they may remain alive it is necessary that their internal parts should by degrees become external and their external parts internal, that the sea should become land and the land sea; that in short, all parts of them should experience all changes of position.¹ Hence the hot and cold bodies of the universe have need of one another. The earth needs the alternations of light and darkness and of heat and cold that are caused by its diurnal and its annual revolutions, as well as those that take place during longer cycles, in order that all its parts may have all temperatures in turn and that the circulation of matter may be maintained. Thus self-preservation is the final cause of the motion, both rectilinear and circular, of all particular bodies in the universe.

All things are perfect with respect to the order of the universe, but not with respect to the desire of self-preservation that is inherent in each particular thing. Nothing in the universe is in itself either absolutely perfect or absolutely imperfect. God and the universe alone are perfect simply and absolutely. For finite things can only have different modes of being successively; God and the universe have all modes of being at the same time, or rather, without reference to time. As the infinity of God differs from that of the universe, so also the perfection. The perfection of God is in the whole and in every part; the perfection of the universe is in the whole but

¹ Bruno finds suggestions of this theory of the "local motion" of the earth in Aristotle. See *Italian Works*, ed. Wagner, i. pp. 192-4.

not in the parts of it taken separately. Things are said to be perfect, not simply and absolutely and in themselves, but in their kind, so far as they attain particular ends. For example, they may be said to be more or less perfect according to the degree of their success in attaining the end of self-preservation. Animals on the earth attain this end imperfectly; for the influx of matter fit to promote their preservation, which is at first greater than the efflux and afterwards becomes equal to it, is at length surpassed by it, and then death of the individual takes place. The heavenly bodies (among which the earth must be numbered) attain the end of self-preservation more perfectly than any other finite things.

The divine will is one with fate. But God acts by the necessity of his own nature, not by a necessity external to himself in the manner of things that are said to be subject to necessity. In God, therefore, necessity is one with freedom. God always acts in the best possible manner because he has perfect knowledge. If men knew all things perfectly they also would always act in the best way, and therefore all would act in the same way. But the wills of men are everywhere perturbed by passion and by the hidden causes of things (*affectu atque rerum latentia*). Hence they must often hesitate before choosing one of two opposite courses. For this reason the liberty of man must be classed among those things that are subject to uncertainty. It is not fitting that this kind of liberty should be ascribed to God.

In one place Bruno distinguishes between divine necessity or fate and the necessity of nature. Knowledge and will are declared to be identical both in God and in nature. The order that is in natural things is a kind of knowledge—the knowledge that each thing has of that which is similar and of that which is dissimilar. This knowledge is identical with the will to seek the one and to escape from the other. Now in nature different effects are never the effects of the same will or knowledge. But particular effects are not always produced when the will to produce them is present, because they may be prevented by the action of other things. Thus “the necessity of nature” is the necessity which we ascribe to particular laws of nature;

"divine necessity" is the necessity by which the whole could not be other than it is.¹

This doctrine of necessity, and that of the coincidence of will, power and act in God, by which it is connected with the doctrine of the infinity of the universe, are not to be taught to the multitude; for although they are not really dangerous to morals, yet they are sure to be misunderstood by the unlearned. This has been considered by those theologians who ascribe to God a free-will resembling that of man. They have seen that the multitude will never be able to reconcile merit and demerit in the choice of justice or injustice by men with necessity in God. But philosophers in teaching the doctrine of divine necessity do not wish to deny the merit of right actions or the moral freedom of man; and therefore "the not less learned than religious theologians" have always been willing to grant freedom of philosophising, and true philosophers for their part have always been favourable to religions.²

In defending himself against those who bring arguments from the Bible against the Copernican astronomy, Bruno takes up the position that the Bible is a moral revelation, not a revelation of speculative truth. The object which a wise legislator has in view is, he says, to teach the multitude to choose the good and to avoid the evil. In aiming at this object he speaks in the manner of the vulgar about things that have nothing to do with practice, leaving the further consideration of them to "contemplative men." If he were to use terms understood only by himself and a few others, and to make great case of things that are indifferent to the ends for which laws are ordained, he would be thought to address himself not to the multitude but to "wise and generous spirits," to those who "without law do what they ought." But for these demonstration is required; faith suffices only for the many, for those who cannot act rightly without external law.

The sacred writers, then, must not serve for authorities when they speak as "presupposing in natural things the sense commonly received," "but rather when they speak indiffe-

¹ *Summa Terminorum metaphysicorum*, Gfrörer, p. 512.

² *Dell' Infinito*, Wagner, ii. pp. 26-7.

rently," that is, without reference to practice. Regard must be had not only to the words of "divine men" speaking thus, but also "to the enthusiasms of the poets, who with superior light have spoken to us." In accordance with this principle Bruno finds in the *Book of Job* suggestions of some of his physical theories; he often quotes passages from *Ecclesiastes* in support of his doctrine of the permanence of substance; and in the Mosaic cosmogony (as in other cosmogonies) he finds the distinction of matter and form. The speculative parts of all religious systems are for him an exoteric philosophy. In one place he says that the veil which covered the face of Moses, and which signified, according to the Cabbalists, a veil that was over the law, was not for deception, but to prepare the eyes of men for the light, which would cause blindness if they were suddenly to pass into it from darkness.¹

The essential end of all religions being practice, it follows that they are good in proportion as they encourage right action. This view is developed in the *Spaccio della Bestia trionfante*, a book which, as Bruno explains in the dedication, has for its chief object to lay the foundation of his moral philosophy. It is only in this book and in its sequel, the *Cabala del Cavallo pegaseo*, that he makes an attack which is direct and at the same time more than incidental on the religion of his age; and this attack is on ethical grounds. The Christianity of the sixteenth century came very far short of his ideal of a religion that should always have ethical ends in view and should not discountenance intellectual liberty. Catholicism seemed to him to exalt credulity and ignorance to the rank of virtues and to discourage scientific curiosity as being in itself evil rather than good; and to Protestantism as a religious system he was less favourable than to Catholicism, for the doctrine of justification by faith seemed to him directly opposed to the true object of a religion. The gods, it is frequently said in the *Spaccio*, ought to be thought of as rewarding the good and punishing the bad actions of men, not for their own sakes, as if they could receive any benefit or injury from their worshippers, but for the sake of men. Laws have been ordained for the good of human

¹ *De Umbris Idearum*, ed. Tugini, pp. 33-4.

society; and because some men do not see the fruit of their merits in this life, there have been placed before their eyes in another life rewards and punishments according to their works.

The *Spaccio della Bestia trionfante* ("Expulsion of the triumphant Beast") is an allegory of which the chief personages are the Greek gods and goddesses. The interlocutors in the dialogues are Saulino—the representative of the philosopher—Wisdom (Sofia), and Mercury. At the beginning of the first dialogue Wisdom relates to Saulino that the gods, finding themselves to have grown old, are offering up prayer to the Fates (although they know that Fate is inexorable), that they may either maintain their present state of being, or, if this is not permitted, then that they may enter into a better and not into a worse state. For Jove and the other gods are subject to change; it may be that they too have to pass the shores of Acheron. And they are afraid that the next great revolution of the world will be quite different from those that have gone before, and will not end in a mere change of dynasty. In order to preserve their existence, they have resolved to put away their vices, and, as a symbol of this change in themselves, to expel from heaven the records of the evil deeds of their youth, and to substitute the moral virtues for the monsters and deified human beings they had formerly placed in the constellations.

The "expulsion of the triumphant beast" from heaven and the assigning of a constellation to each virtue is effected by a council of the gods which is called by Jupiter. The mythological monsters and the heroes who had had places in the constellations along with them are disposed of in various ways. Hercules and Perseus are sent down to the earth to slay or expel certain new monsters that trouble it. By these the spirit of superstition and religious persecution is signified; and this expulsion of monsters from the earth is a second meaning of the title of the allegory.

The virtues to which the gods assign the chief places in heaven are, in order of dignity, Truth, Providence or Prudence, Wisdom, Law, and Judgment. Truth is explained in the dialogues to be, in the highest sense, identical with the

first Principle of things, with the One and with the Good. This first and highest Truth is superior to Jupiter. Besides the truth that is said to be "before things" as being their cause and principle, there is a truth that is "in things" and a truth that is "after things." The truth that is in things is that by participation in which they have being. The truth that is after things is the knowledge of them as it is in the human mind. Providence is "the companion of Truth," and is identical with liberty and with necessity. In its lower form it is called Prudence, and is the discursive knowledge which the mind has of the order of the universe. Wisdom, like Truth and Providence, has a higher and a lower form. Its higher form is identical with Truth and with Providence. Its lower form is not truth itself but participates in truth, as the moon shines by the light of the sun. The first Wisdom is above all things, the second is "communicated by words, elaborated by the arts, polished by discussions, delineated by writing." Law is the daughter of Wisdom. It is by Law that states are maintained. No law is to be accepted that has not for its end to direct the actions of men in such a way that they may be useful to human society. Next to Law has been placed Judgment, into whose hands Jove has put the sword and the crown, for the punishment of the bad and the reward of the good. By the representative of this virtue services and injuries done to the commonwealth are to be judged greater than all others; internal sins are to be judged sins only so far as they are capable of having an external effect; repentance is to be approved but not to be esteemed equal to innocence.

That which is brought out most clearly in this distribution of the chief virtues is the importance that Bruno attaches to knowledge as an essential condition of right action. The distribution of the virtues that follow judgment has less purely philosophical interest; but the discussions of particular virtues help to show us what was Bruno's moral ideal. They display his admiration for the illustrious characters of Greece and Rome and his preference of the antique type of the hero to the mediæval type of the saint.

It has already been seen that Bruno regarded the super-

natural sanction of morality as having some value for those whose actions must be regulated by external law. Since the fear of human justice is not sufficient to repress wrong-doers, it has been necessary, he says, that the fear of divine justice should be added. The anthropomorphic gods may preserve their existence by doing reverence to the Truth that is above them and by making themselves the guardians of morality.

An episode of the *Spaccio* which has much interest in relation to Bruno's philosophy of religion is the discussion of Greek and Egyptian polytheism in the third dialogue. It is contended that both the Greeks and the Egyptians worshipped under many forms the one divinity that is latent in all things; the Egyptians chiefly under the forms of animals, the Greeks chiefly under the forms of men. Jupiter was once a king of Crete and a mortal man; the name of Jupiter was given to the divinity seen under a certain aspect, not because it was supposed that the mortal Jupiter was a god, but because it was held that the divinity was in Jupiter as in all things, and because in the extraordinary magnanimity or justice of Jupiter was seen the magnanimity or justice of the divinity. As the Greeks gave the names of men who had once lived on earth, and in whom more than in others certain divine qualities had been present, to particular aspects of the divinity, so the Egyptians gave the names of various animals to aspects of the same divinity manifested in its descent to the production of natural things. It is maintained by Isis in the assembly of the gods that the wisdom of the Egyptians consisted in knowledge of the processes by which the life that is manifested in the multiplicity of things returns to its source, and that this knowledge was embodied in the Egyptian religion. The Greek and Egyptian deities complain that the Jews and the Christians, having really fallen into the errors from which their own worshippers have been proved to be exempt, and being besides open to every accusation they can bring against others, yet reproach with idolatry those whose knowledge of the divinity was far greater than theirs. Isis declares that the followers of new religions have triumphed, not by their own merits, but because fate, in the vicissitudes of things, gives its time to

darkness. The prophecy is ascribed to Hermes Trismegistus, that after the ancient religions have fallen there shall come a time when darkness shall be preferred to light and death to life, when those who attach themselves to "the religion of the mind" shall not be permitted to live; but after these things have happened the world shall by some new revolution be restored to its ancient countenance.

In all this it is clear that Bruno regarded those religions from which the pantheistic view of nature had not disappeared as more favourable to the true philosophy than the monotheistic religions; but these passages must not be understood as a direct attack on Judaism or Christianity. To aim directly at the subversion of the popular religion because it was unfavourable to the true philosophy would have been inconsistent with his view that the end of all religions is properly ethical. The difference between the positions he takes up when he is considering religions from the point of view of ethics and when he is considering them from the point of view of his philosophy of nature is seen in this: that the goddess of Wisdom is represented as expecting the return of light in Europe after a long period of darkness, but as not having control over the vicissitudes by which the alternation of light and darkness is caused, while Judgment on the other hand is directly charged by the gods to destroy those forms of opinion that represent them as indifferent to the actions of men and caring only for their beliefs.

Some have found in the *Eroici Furori* an expression of Bruno's "esoteric religion." This term, however, does not seem to be strictly applicable here; for Bruno always associates religion with ethics, and he distinguishes the "infinite aspiration" which is the subject of the *Eroici Furori* from "virtue" as defined by him in the same book.¹ His definition of virtue is founded on his theory of pleasure and pain. According to this theory all pleasure consists in a certain transition, and is pleasure only by contrast with a state of pain that has preceded it. Since in this transition, as in all motion, contraries coincide, since the end of one of two contrary states is the begin-

¹ Part i., Dialogue 2.

ning of the other, there can be no pleasure without mixture of pain. At the highest point of pain or of pleasure the wise man always expects a reversal of his state. By considering the mutability of things he may at length arrive at indifference to all pleasures and pains. It is in this indifference that perfect virtue consists.¹ As the wise man is set free from subjection to pleasures and pains by the knowledge that in the vicissitudes of things all states are at length reversed, so he is set free from subjection to the desire of self-preservation by the knowledge that nothing which is substantial can truly perish. This liberation from "the fear of fortune and death" is described by Bruno as one of the chief results of his philosophy. It is conceived as an ethical state, since the disposition of the wise man with respect to mutable things is identified with virtue. At the same time it is not regarded as attainable by the mere practice of morality, but only by the contemplation of philosophic truth; and this is accessible only to the few.² To this outcome of Bruno's philosophy the name of an esoteric religion may properly be given. He himself contrasts it with the "vain fear and desperation" caused in "stupid and ignorant souls" by "foolish faith and blind credulity."³

In the *Eroici Furori* it is not the ethical effect of the contemplation of truth, but the pursuit of truth in itself that is described. The *eroico furore* is first of all the desire of absolute truth. It is said to be different from other *furori* not as a virtue from a defect, but as a defect that is in a more divine subject or that is present in a more divine manner. The *eroico furioso* resembles the ideally wise or virtuous man in having escaped from subjection to the desire of self-preservation and to common pleasures and pains; but he differs from him in this, that in the pursuit of his object he never attains the point of indifference. He has no sooner perceived truth

¹ Bruno does not deduce the particular virtues from his definition of the ideal virtue which is the result of the contemplation of philosophic truth. It has been shown by Hartung that Aristotle's doctrine of the mean has had more influence on the definitions of particular virtues in the *Spaccio* than any other general principle.

² See for example the opening of the seventh book of *De Immenso*.

³ *Spaccio della Bestia trionfante*, Wagner, ii. p. 241.

under any one form than he perceives the limits of that form. Thus he is constantly impelled to go beyond that which he possesses ; for the mind cannot rest satisfied with a knowledge that is limited and therefore imperfect. Since knowledge is impossible except under limits, he is always in motion between the extremes of pleasure and pain.

The *eroico furore* is sometimes described as an "intellectual love." It includes not only the desire of absolute truth, but also the desire of absolute beauty. This desire is excited by the beauty which is perceived in particular forms, and which is one of the manifestations of the soul of the world. But beauty, like truth, can only be perceived under limits beyond which the mind is impelled to pass ; and therefore the pursuit of beauty also is a pursuit of which the end can never be attained.¹

It is to be observed that the use of the word "matter" in the dialogues that have just been considered differs from the use of the same word in *Della Causa*. Matter, in the *Eroici Furori*, instead of being described as that which produces from itself forms which it contains implicitly, is described in the manner of the later Platonists, as that which impedes the ascent of the spirit. Bruno was not unconscious of this difference. In the dedication of the *Eroici Furori*, and in other places, he suggests an explanation of it. It is a difference of expression that is explained by his doctrine of "the circle of ascent and descent." The forms that are emerging from "all-productive matter" seem to themselves to be impeded by it, because of the necessity they are under of passing through intermediate forms before reaching those that are highest. And the forms that are descending in the scale of being seem to themselves to be obeying an attraction towards "a less good," when they lose in the multiplicity of "the imagina-

¹ In this theory of the divine or heroic madness, an advance may be noted on the doctrine of Plato from which it is derived. Bruno, finding in his essentially stoical ethics no place marked out for the intellectual aspiration that was so characteristic an element of his own temperament, is led to draw a clear distinction between the intellectual or æsthetic and the properly ethical impulse. With Plato they are always presented in a kind of fusion.

tion" the unity of "the mind." If, on the other hand, the process of change is looked at as it were from the outside, it is seen that both the ascent and the descent of beings are determined by "the necessity of an internal law."

Not only does the idea of two kinds of change undergone in perpetual alternation by all forms of things supply the explanation of differences of expression as regards "matter" that are met with in Bruno's works, but, as has been already indicated, the doctrines of the "soul of the world" and of the absolute mind or intellect, which have been supposed by some to belong to different stages of his thought, are united by this idea. The theory of metempsychosis which is developed chiefly in the *Eroici Furori*, but which appears also in the *Spaccio* and in the *Cabala del Cavallo pegaseo*, is in part an expression of this idea in the form of a kind of philosophic myth. At the same time a concrete form is given to other ideas by means of it, and in particular to the doctrine of the permanence of mind.

Bruno finds the elements of his theory of metempsychosis in the traditions as to the teachings of the Druids, the Chaldæans, and the Magians, in the opinions ascribed to Pythagoras, and in the doctrines of the Cabbalistic Jewish sects and of some of the Platonic schools. He represents the souls of men, of animals, and even of things commonly called lifeless, as alike in substance and differing only as to the kind of body they have last received. According to the nature of their deeds and aspirations when dwelling in one body will be the nature of their next embodiment. Each soul modifies the shape of the material substance of its own body as it becomes itself better or worse. Thus from the outward forms of men it may be known whether their next embodiment will be of a higher or of a lower kind. In the eternal metamorphoses of matter all souls receive all corporeal forms. No soul ever reaches a final state; all alternately approach and recede from the unity of the absolute intellect, become subject to matter and escape from it. This is figured in mythologies by the legends of gods that have assumed the shapes of beasts and at length by their innate nobility resumed their own forms. Those who aspire

to the divinity by intellectual love may be described as changing themselves into gods. That metamorphosis is of all things and is eternal, and that all souls must return from the highest to the lowest and again from the lowest to the highest state, has been taught by all the great philosophers except Plotinus. All the great theologians, with the exception of Origen, have taught that metamorphosis is neither of all things nor eternal, but that those changes which are undergone by a certain number of souls have a period. The doctrine of the theologians is fit to be taught to those who, being now with difficulty restrained from evil, would be restrained with still more difficulty if they came to believe themselves subject to some lighter conditions of reward and punishment.¹ But that doctrine is to be esteemed true which is taught by "those who speak according to natural reason among the few, the good and the wise."

It is clear from many incidental expressions that, as Bartholmæss says, Bruno does not advance the theory of metempsychosis as a positive doctrine. Yet, as has been seen, he conveys under the imaginative form of this theory some of the principal ideas of his philosophy. From his mode of combining the idea of metempsychosis with that of metamorphosis it may be inferred that his doctrine of "the immortality of the soul" is not a doctrine of personal immortality in the ordinary sense. He holds, perhaps, that a higher immortality than that of metempsychosis is attained by some souls but not by all.² In accordance with what he supposed to be the Pythagorean doctrine, handed down by Plato and by later poets and philosophers, he speaks of the souls as drinking of Lethe before passing into a new state.

"Has omnes, ubi mille rotam volvere per annos,
Lethaeum ad fluvium Deus evocat agmine magno;
Scilicet immemores supera ut convexa revisant,
Rursus et incipiant in corpora velle reverti."

¹ Wagner, ii. p. 309. Bruno, however, does not always admit even the utility of the theological dogma in question here. See *De Immenso*, vii. c. 11.

² *De Minimo*, i. c. 3. The expressions here as regards immortality are derived, directly or indirectly, from the often-quoted saying of Heraclitus: ὅτε μὲν γὰρ ἡμεῖς ζῶμεν, τὰς ψυχὰς ἡμῶν τεθνάναι καὶ ἐν ἡμῖν τεθῆσθαι, ὅτε δὲ ἡμεῖς ἀποθνήσκομεν, τὰς ψυχὰς ἀναβιοῦν καὶ ζῆν.

Or as Bruno expresses it in the language of his own philosophy, the transmigrating souls, by the compassion of Fate, are caused to drink of the waters of Lethe before receiving new forms, in order that they may suffer as little pain as possible from the inevitable contradiction of their desire to maintain their states, and that after every change of embodiment they may remain equally desirous of preserving themselves in their new state of being.

NOTE.

In the foregoing pages, the aim of which was to expound Bruno's ideas in their relation to each other, nothing is said about a question touched upon in an interesting manner in the *Life of Giordano Bruno*, by I. Frith (Trübner, 1887), published since the article appeared in *Mind*. It has been suggested more than once, and is again suggested in the valuable biography just referred to, that Bruno may have had an influence on contemporary English literature. This seems not unlikely; though it is often difficult to decide between a possible influence from Bruno and the influence of Renaissance Platonism on Bruno and his English contemporaries alike. A definite influence from Bruno, I am inclined to think, may be traced at least in Spenser's Cantos on Mutability. Some further discussion of Bruno's philosophy will be found in the review, below, of the second edition of Carrière's *Philosophische Weltanschauung der Reformationszeit*. In that review the position as regards the general character of Bruno's philosophy taken up both by Carrière and by the author of the English *Life* is critically examined.

THE MUSICAL AND THE PICTURESQUE ELEMENTS IN POETRY.

Ἀπὸ δὲ πάσης τῆς ποιήσεως ἔν μῦριον ἀφορισθὲν τὸ περὶ τὴν μουσικὴν καὶ τὰ μέτρα τῷ τοῦ ὕλον ὀνόματι προσαγορεύεται. ποίησις γὰρ τοῦτο μόνον καλεῖται, καὶ οἱ ἔχοντες τοῦτο τὸ μῦριον τῆς ποιήσεως ποιηταί.—ΠΛΑΤΟ.

WHEN it is said that the basis of poetry is imagination, much depends on what is meant by the term. Does it mean the creative faculty, that is, above all, the power of representing character in action; or does it mean simply the power of visualising? In the first sense, it truly defines the material of the greatest poetry; in the second sense, it describes one of the formal elements in poetic art generally. The question may be asked about imagination in the first sense, whether it is sufficient, apart from all formal qualities, to constitute a poem; and, about imagination in the second sense, whether it comes first among formal qualities, or whether there is another, namely, metrical quality, that takes a higher place. My present object is to discuss the second of these questions.

Upon the first question, the opinion may be hazarded that if a work of creative imagination in prose is ever to be regarded as properly a poem, it must be by suffusion with a kind of feeling that would naturally find its expression in metre. The perception of fatality in the development of interacting characters to an inevitable event, for example, brings with it the unity of feeling that is characteristic of tragedy. Accidentally, such a work may be in prose and not in verse; but it is in verse that the dominant feelings of "terror and pity" tend to express themselves. Now, at a first glance, that element in poetic form which is the natural and primary expression of poetic matter seems to be the essential element.

By considering the formal qualities of poetry directly, we shall be led to the same conclusion. Some, indeed, seem to think that imagination in the second sense, or the power of visualising, is the supreme poetic quality. It has a certain objectivity that seems to make it less personal, more disinterested, than the "passion" that finds its natural expression in music of verse. Hence the view, once prevalent, that all art, poetic art included, can be defined as "imitation of nature." And this view, it must be allowed, is one that its defenders might maintain while conceding that there is an indefinable personal quality present in all poetical work, and indeed in all art, whether specifically personal or impersonal in its attitude towards nature and man. Taking this quality—which, they might point out, is exactly the element that eludes analysis—as "a constant," as something always present in anything that can be called poetry, they might insist that an impartially objective view of the world is that which characterises the highest poetry; and that poets are to be placed higher or lower according to the degree in which they succeed in being objective and impartial. This objective character, they might say, is best described as a character of "the poetic imagination."

To this it may be replied that insight into the reality of things is rather a part of the meaning conveyed by poetry than an element of its form, imaginative or other. But the first question for criticism is, in which of the elements that can be detected by analysis does the indefinable, unanalysable quality of poetry most of all reside.

In order to get rid of the ambiguity in the word "imagination," let us substitute for imagination in the second sense, or the power of visualising, the term *picturesque* quality. This is commonly opposed to musical quality. Both terms refer entirely to form; and they divide between them all the formal qualities of poetical work. For the term "*picturesque*," though strictly it ought only to be applied to those characters of the imagery of a poem that recall the effects of a picture, has come to be applied to the whole of the qualities that depend on visual imagination. The explanation of this extension of

meaning is that, just as the imagery of ancient poetry has most affinity with sculpture, so the imagery of modern poetry has most affinity with painting. Its meaning being thus extended, the term "picturesque" describes half the formal qualities of a poem. The term "musical" describes the other half. Thus the antithesis of musical and picturesque is at once clear, having reference exclusively to form, and at the same time perfectly general.

Are the two elements distinguished by these terms of equal value? Or is one of them the essential poetic quality, and the other a subordinate element to be taken into account by criticism in an estimate of the total artistic value of poetical work, but not directly affecting its value merely as poetry?

Examination will make it clear that the essential element in poetry is that which is described by the term "musical" when properly interpreted. The true interpretation of both terms may be arrived at by developing the consequences of Lessing's theory of the limits of poetry and painting.

Lessing proved in the *Laocoon* that the method of the poet must be different from that of the painter (or of the sculptor); that the poet cannot imitate the painter in his treatment of the subjects they have in common, and that the painter cannot imitate the poet. He shows by examples what difference of treatment actually exists, and deduces it from the necessary conditions of the arts of expression in words and in colours. There is this difference of treatment, because in poetry images are represented in their relations in time, while in painting objects are represented in their relations in space. In detailed descriptions of beautiful objects the poet cannot equal the painter; but he is not confined, like the painter, to a single moment of time. The poet describes the effects of things, not merely the things themselves; and thus he can convey ideas of beautiful objects by methods of his own which the painter cannot employ. But to produce a "poetic picture," that is, a picture not of an object but of an action or event, which consists of successive phases related in time, not of coexistent parts related in space, is the true aim of the poet.

Now Lessing's conception of a poetic picture—a picture in

words of a series of images related in time—is not a perfectly simple conception. We may discover in it by analysis those suggestions of distinct pictures which, as Lessing admits, are made incidentally by the poet without attempting anything beyond the limits of his own art. The words of the poet call up images of what existed at those particular moments which the painter might select if he were working on the same subject. Is it, then, the mere relation of these images in time, or is it some remaining thing, that makes the picture poetic? That it is some remaining thing, and that this is the “musical element,” will become clear from an example. We will select one from Milton—

“Down a while

He sat and round about him saw unseen.
At last, as from a cloud, his fulgent head
And shape star-bright appeared or brighter, clad
 With what permissive glory since his fall
 Was left him or false glitter.”

This passage is a perfect example of a “poetic picture” in Lessing’s sense; and there is no difficulty here in detecting the presence of the two elements. The poetic effect does not proceed merely from the vivid objective representation of the phases of an action or event as they follow one another in time. A particular image out of the series—that which is contained in the italicised lines—rises before the imagination. The movement in which the mind is really absorbed is not the external movement, but the musical movement of the verse; and on the stream of this musical movement there is the single image appearing. But since Milton is especially a musical poet, we will also take an example from a picturesque and objective poet; let us take Homer’s description of the march of the Grecian army:—

“*ἦν τε πῦρ αἰδηλον ἐπιφλέγει ἄσπερον ἦλην*
οὐρεος ἐν κορυφῇ, ἔκαθεν δὲ τε φαίνεται αὐγῇ,
ὥς τῶν ἐρχομένων ἀπὸ χαλκοῦ θεσπεσίῳ
*αἶγλη παμφανόωσα δι’ αἰθέρος οὐρανὸν ἵκεν.”*¹

¹ “Like as destroying fire kindles some vast forest on a mountain’s peak, and the blaze is seen from afar; so, as they marched, the dazzling gleam of their awful armour reached through the sky even unto the heavens.”—*Il. ii. 455-8.*

Do we not here perceive as separate images, first, the blaze of the forest, and then the gleam that is compared with it, of the armour? We are at the same time conscious of the march of the army; but this movement is, as it were, identified with the rhythmical movement of the verse. Here, as before, a particular image rather than the whole objective movement is realised in imagination. To this realisation of definite pictures is added the rhythmical movement, in other words, the musical element, of the verse. This alone is the element in poetry that has time for its condition; and time, not space, is, as we have seen, the fundamental condition of poetic representations. Of the two formal elements of poetic effects, therefore—musical movement and separate suggestions of picturesque imagery—it is clear that the first, since that alone depends on the fundamental condition of poetic representations, must be regarded as the essential element.

Thus, by considering the nature of the formal conditions of poetic expression, we find that the effects which recall those of painting (and sculpture) are subordinate to the musical element. But in order to meet a possible objection, it is necessary to point out that the effects of music itself and of poetry are not, as is implied in some criticisms, identical. Sometimes the remark is made about verse that possesses musical quality in a very high degree that it "almost succeeds in producing the effect of music." Such criticisms convey the idea that the effort after intensity of musical effect in verse is an attempt to pass beyond the limits of verbal expression, and therefore that it does not properly belong to poetry. But the musical effect of verse is of its own kind, and is produced by methods peculiar to the poet. The resemblance that there is between musical verse and music is due to resemblance in the general conditions of their production; music, like poetry, has time for its formal condition, and in music as in poetry the effect depends immediately on sequences of sound; but there need not be any imitation either on the part of the poet or of the musician. This becomes evident from the observation that many people who are very susceptible to music care little for metrical effects in poetry; while, on the other hand, those who care

most for lyric poetry have often no peculiar susceptibility to music.

For those who can accept provisionally the conclusion that the musical element is the essential element in poetry, an examination of the characteristics of the poets in whose work musical quality becomes most manifest, as a quality distinct from all others, will not be without interest. In the first place it may be asked, is there any mode of dealing with life and with external nature that is characteristic of those poets who display this quality pre-eminently? Admitting that all material is of equal value to the artist, we may still find that some particular mode of treatment of that which is the material of all art is spontaneously adopted by poets who manifest the essential poetic quality both in its highest degree and in such a manner that it is perceived to be distinct from all others.

Artistic qualities generally become most distinct, most separable in thought from other qualities, in lyric poetry. If, then, there should be any discoverable relation between mode of treatment of material and mode of manifestation of poetic quality, this will be found most easily by studying the work of poets whose genius is of the lyric order. It is even possible that such a relation may exist in lyric poetry only. We may see reason for concluding that a certain mode of treatment of life is characteristic of the greatest lyric poets, but this conclusion may have no further application.

The general condition of the manifestation of lyrical power may be found without much difficulty. This condition is expressed in the remark so frequently made that lyric poetry is "subjective." As it is used in criticism the term is sometimes rather vague; but it really describes very well the change that all actual experience undergoes in becoming material for lyric poetry. The lyric poet resolves all human emotion and all external nature into their elements, and creates new worlds out of these elements. Now this process has a certain resemblance to the resolution of things into their elements by philosophical analysis. The method of the poet of course does not end in analysis; but that resolution of

emotion into a few typical poetic motives, and of nature into ideas of elementary forces and forms, which is the first condition of the creation of the new poetic world of the lyricist, resembles the analytical process of the philosopher taken by itself in that it is subjective. The term has therefore not been misapplied in this case in being transferred from philosophy to literary criticism.

The subjective character of lyric poetry is so obvious that it has been noticed as a fact even by those who have not seen the reason that determines it. The reason why the lyric poet must be "subjective" is this: in order to produce a distinct impression by the form of his work, he must have the material perfectly under his control. Now the material cannot be under the control of the poet unless he selects from that which he finds in life, accentuating some features of experience, and suppressing others. To make this selection possible analysis is necessary; and then, the more complete the transformation of human emotion with all its circumstances into a new "subjective" world, the more complete is also the detachment of form from matter, the more intense is the impression given by the form alone.

This transformation may be brought about in two different ways. One of these consists in contemplating from the point of view of a peculiar personality the few typical emotions and ideas to which analysis reduces all the rest. A new world is created in which some effect of strangeness is given to everything. After the treatment of earlier artists has been studied, an effort is made to express what has been left by them incompletely expressed—all those remoter effects of things which they have only suggested. Baudelaire, who has carried this method to its limits, has also given the theory of it. He called it the research for "the artificial," and regarded it as the typical method of modern art. The other method is to give to the mood that is selected as the motive of a poem a special imaginative character by associating with it some typical episode of life, colouring this brilliantly, and isolating it from a background that is vaguely thought of as made up of commonplace experience. This mode of treatment of life is to a certain

extent that of all poets ; but some lyrists—Burns and Heine, for example—have carried it to greater perfection as a poetic method than the rest. Lyrics such as Heine's have for their distinctive character an intensity of emotional expression which has led some critics to praise them as not being "artificial." But they are really quite as artificial, in a sense, as those with which they are contrasted. For nothing in them is taken directly from life. The episode that is selected has a certain typical character by which it is removed from real experience ; in being emphasised by intensity of expression and by contrast it is of course equally removed from the world of abstractions. Thus it is true here, as everywhere else, that "art is art because it is not nature."

But among the lyric poets themselves there are some in whose verse the musical quality becomes more distinct than it does in the verse of those who may be characterised by their use of one of the two methods described. The musical quality in the verse of the poets referred to above is of course unmistakable, but it is not the quality which we select to characterise them. In the one case intensity in the expression of a mood is most characteristic, in the other strangeness in the colouring. But there are some poets who are pre-eminently "musical," whom the musical quality of their verse would be selected to characterise. Is there any peculiarity in their mode of treating the material of all poetry, by which this still greater detachment of form from matter can be explained ?

In order to determine this, the best way of proceeding seems to be to compare the poets of lyrical genius of some one literature, and to try to discover what those poets have in common who, in musical quality of verse, are distinguished above the rest. For this purpose we may be allowed to choose English literature.

The first great English poet who is above all things musical is Milton. The distinction of musical from picturesque qualities has indeed been used as a means of defending Milton's claim to be placed in the first order of poets against those critics who have complained that he does not suggest many subjects for pictures. And we must place Milton among poets

whose genius is of the lyrical kind, though most of his work is not technically lyrical—especially if we accept as universal among the greater poets the distinction of lyric from dramatic genius. Spenser's verse is, of course, extremely musical; but we do not think of the music of his verse as that which is most characteristic of him. His distinction consists rather in what Coleridge describes as the dream-like character of his imagery. After Milton, the next great poet who is eminently musical is Shelley. It will be said that Coleridge and Keats are, equally with Shelley, poets whose verse has the finest qualities of rhythm. But in Keats, what Mr. Arnold has called his "natural magic," and in Coleridge certain other imaginative qualities, are what we think of as characteristic; for these qualities are scarcely distinguishable from the medium of expression; the music of the verse is not felt as something that produces an effect of its own apart from the effect of other artistic qualities. Now in some of Shelley's lyrics no formal quality seems to exist except the music; a clear intellectual meaning is always present, but often there is scarcely any suggestion of distinct imagery. The power that he shows in these lyrics of giving music of verse an existence apart from all other formal qualities is what makes Shelley more of a musical poet than Coleridge or Keats; and no other poet of the same period can be compared with these in this quality of verse. From the period of Shelley to the present time the poet who is distinguished above the rest by the musical quality of his verse is Mr. Swinburne. And he has, in common with Milton and Shelley, the power, which Shelley perhaps manifests most of all, of detaching musical quality from all other formal qualities. If the same poets have also something in common in their selection of material, then it is probable that this will be found to have some relation to their attaining the last limit of detachment of the essentially poetic quality from all others.

A ground of comparison is found in the power these poets have of expressing what may be called impersonal passion. Like all other poets of lyrical genius, they often express personal emotions; but they also give peculiarly distinct

expression to emotions that have an impersonal character—emotions that are associated with a certain class of abstract ideas. What, then, is the nature of these abstract ideas?

They are ideas that may be found by analysis in all poetry. By some poets they are distinctly realised, but oftener they make their influence felt unconsciously; and when they are distinctly realised they may or may not be the objects of emotion. They represent the different ways in which the contrast is conceived between the movement of external things on the one hand, and the desires and aspirations of man on the other. The opposition of man and things outside is implicit in Greek tragedy, for example, as the idea of fate. And both in ancient and modern lyric poetry the conception of the dark background of necessity gives by contrast an intenser colouring to the expression of particular moods. There can be no finer example of this than the fifth ode of Catullus, where the peculiar intensity of effect is given by the reflection that is interposed:—

“Soles occidere et redire possunt;
Nobis, cum semel occidit brevis lux,
Nox est perpetua una dormienda.”²

But this contrast may not be employed merely to give emphasis to personal moods; it may become independently the object of an emotion. Now the three English poets whom we have seen grounds for comparing, all express an aspiration towards a certain ideal of freedom. This aspiration is, on the emotional side, sympathy with the human race, or with the individual soul, in its struggle against necessity, against external things whose “strength detains and deforms,” and against the oppression of custom and arbitrary force; on the intellectual side it is belief in the ultimate triumph of the individual soul over the circumstances that oppose its development, or of man over destiny. But with fundamental identity, both of ideas and of sentiments, there is difference in the form they assume. The exact difference can only be made clear by a comparison of particular poems.

² “Suns may set and rise again; we, when once our brief light has set, must sleep for ever in perpetual night.”

In his essay on Mr. Matthew Arnold's poems, Mr. Swinburne has said that the *Thyrsis* of Mr. Arnold makes a third with *Lycidas* and *Adonais*, and that these are the three greatest elegiac poems, not only in the English language, but in the whole of literature. Some readers may be inclined to add Mr. Swinburne's own *Ave atque Vale*. If we compare his elegy with the elegies of Milton and Shelley, the difference in the form assumed by the idea the three poets have in common becomes distinct. For Milton the constraint that is exercised by things, their indifference to man, is embodied in "the blind fury with the abhorred shears;" with Shelley the mutability of all the forms in which life manifests itself is the intellectual motive of this as of many other poems; while Mr. Swinburne brings the permanent background of silence and unconsciousness into contrast with the individual spirit, and represents it as absorbing all things into itself. Though in all three poems the idea of future fame as a compensation for the temporary victory of blind forces is suggested, there is nevertheless a difference in the form in which confidence in the final victory of the soul over destiny expresses itself; but this is seen more clearly in other poems than in these, which are partly personal in motive. The triumph of the human soul is conceived by Milton as a supremacy of the individual will over circumstance. This conception is above all that of *Samson Agonistes*. Shelley expresses the belief in the permanence of certain ideas, such as that of "intellectual beauty," under all changes of superficial appearance. And with Mr. Swinburne, just as the opposition of man and destiny is represented in its most general form—

"Fate is a sea without shore, and the soul is a rock that abides;

But her ears are vexed with the roar and her face with the foam of the tides:"

—so the triumph of man over destiny is represented in its most general form as the conquest of external things by "the spirit of man."

It is through this power they have of representing an ideal as triumphant that poetic form becomes more separate in the

work of these than of other poets. The general relation between manifestation of lyrical power and mode of treatment of the material presented by life was found at first to be that the more completely experience has been resolved into its elements and transformed into a new subjective world, the more distinct must formal poetical qualities become. It was said that this transformation may be brought about either by the interpreting power of a peculiar personality, or by a heightening of the colours of some typical episode of human experience. But, as we have seen, there is a further stage of this transformation. By a kind of insight that belongs to the highest class of poetic minds of the lyrical order, certain tendencies for ideals to be realised are selected from among all actual tendencies of things, and then become the objects of emotion which embodies itself in poetic form. Now to associate emotion in this way with abstract ideas is a means of making the "criticism of life" that is contained in poetry still more remote from life itself. The power of expressing impersonal passion is, therefore, on its intellectual side merely the most complete development of the way of looking at life that was found to be characteristic of the lyricist.

The connexion that actually exists between the highest qualities of rhythmical expression and a certain way of viewing the world, is thus seen to have grounds in the nature of things. But when the detachment of poetic form as a thing existing by itself is said to be the effect that is characteristic of a particular group of poets, it must not be understood that these poets are limited to effects of one kind. They are able to deal with subjects and to produce effects that are outside the sphere of other lyric poets; but this does not prevent them from having equal powers with the rest within that sphere. Hence there are differences in the effect of their work as a whole, depending on differences in the combination of other artistic qualities with the essentially poetic quality, besides the differences already discussed. This will be seen if we carry the parallel a little further.

There is, for example, a difference between Milton's treatment of external nature under its imaginative aspect and that

of the two later poets. In reading Milton, the peculiar imaginative effect experienced is that which is produced by the contemplation of enormous spaces. The later poets, on the other hand, give a characteristic quality to their imaginative representations of nature by endowing the elementary forces and forms of the world with a kind of life. Objects are not described as portions of a mechanism, but are identified with a spirit that gives them motion. Two equally perfect examples of this are the description of dawn at the opening of the fourth act of *Prometheus Unbound* and the description in one of the choruses of *Erechtheus* (in the passage beginning "But what light is it now leaps forth on the land" . . .) of the sudden reappearance of the sun after having been obscured. There is nothing in Milton corresponding to this mode of conceiving nature. The spheres, with him, are guided by spirits that act on them from outside; they are themselves lifeless.

In some respects, however, Mr. Swinburne resembles Milton and is unlike Shelley. This is the case as regards specially picturesque effects. Shelley suggests a greater number of distinct pictures corresponding to particular moments; with Milton and with Mr. Swinburne the picturesque effect is not so easily distinguished at first from the musical effect, but there is a stronger suggestion of a background that remains permanent while individual objects disappear. As has been already said, Shelley does not always attempt picturesque effects; the imagery in some of his lyrics is of the faintest possible kind; it is something that is vaguely suggested by the idea that gives shape to the poem and the emotion that animates it, rather than something that exists for its own sake. But when he does attempt picturesque effects he becomes one of the most picturesque of the poets who can be compared with him as regards music of verse. It is the peculiar character of the effects he produces that prevents this from being always recognised. Many of Shelley's descriptions are exact representations of the more indistinct impressions that are got from natural things; as it has been put by some critics, he describes temporary forms of things rather than permanent

objects. His pictures have the effect of a combination of form and colour that has only existed once and will never exist again ; of a phase in a series of transformations in the clouds, for example. That is, in describing those changes that are the material of "poetic pictures," he does not select for most vivid representation the moments that convey the strongest suggestion of permanence, but rather those that convey an idea of fluctuation. When this is considered, the want of suggestions of permanent backgrounds, of solid objects, cannot be regarded as a defect ; for the presence of these would be inconsistent with the production of a picture of the kind described. It is possible, however, that a relation might be discovered between Shelley's power of producing pictures of this kind and a certain want of artistic completeness that is noticed in some of his work. Whatever may be the cause of it, much of Shelley's work appears to have been less elaborated than that of Milton or of Mr. Swinburne. There is less "form" in the more restricted sense—that is, less purely literary quality. In Milton there are always present certain qualities of style that could not be imagined by a critic to be the result of anything but the most complete artistic consciousness. A similar quality of style is perceived in Mr. Swinburne's work. As an example of the extent to which he manifests this quality, it is sufficient to refer again to *Ave atque Vale*.

The difference between the picturesque qualities of Shelley's work and of Mr. Swinburne's may be illustrated by comparing their mode of treatment of such a conception as that of a procession of divine forms. There is in one of the best known lyrical passages of *Hellas* a description of "the Powers of earth and air" disappearing from the eyes of their worshippers—

" Swift as the radiant shapes of sleep
From one whose dreams are Paradise."

If we compare this with the passage in *The Last Oracle* beginning—

" Old and younger gods are buried or begotten," . . .

the difference that has been pointed out becomes quite clear.

Shelley's imagery is in itself more consistent: although the images that are suggested are vague and fluctuating, yet they call up a picture that can be realised as a whole by the imagination. The passage in Mr. Swinburne's poem does not suggest imagery that can be realised so distinctly merely as imagery; but the forms that "go out discrowned and disanointed" give the impression of being more concrete than those described by Shelley: a more vivid sense is also conveyed of something that remains while all forms perish one after the other; the "divers births of godheads" are contrasted with "the soul that gave them shape and speech." An idea similar to this is indeed suggested in the chorus of *Hellas*, but it is not brought out so distinctly. Shelley makes the idea of the changing phases of the perpetual flux of forms most vivid; Mr. Swinburne, on the other hand, makes most vivid the idea of that which is contrasted with all temporary forms of things. Thus he often employs conceptions like those of the avatars in Hindu mythologies. In the poems of *Dolores* and *Faustine*, for example, there are conceptions of this kind. The ideal figures in these poems are not ghosts like Heine's "gods in exile," but embodiments of a spirit that is conceived as having remained always the same while changing its superficial attributes in passing from one age to another.

Returning from this attempt to characterise some of the resemblances and differences in the work of those poets who have more in common than any other of the greater English poets, we come upon the question whether the general idea that has been partially developed can be applied to dramatic as well as to lyric poetry. In its application to dramatic poetry (supposing this to be possible), it could not, of course, receive the development of which it is capable when applied to the work of poets whose genius is of the lyrical order. The dramatic is more dependent than the lyric genius on the unanalysed material that life presents to it directly; and the conditions of the drama prevent that almost complete detachment of the essentially poetic element which we perceive in some lyrics. On the other hand, this element is intrinsically the same in the drama and in the lyric, though it differs in its

mode of manifestation. While it seems in the lyric to assume an existence apart, in the drama it emerges at particular moments in the progress of the action. From the poetic point of view all other parts of the drama exist for the sake of these. And this poetic effect, being produced, like the effect of lyric verse, by the rhythmical expression of emotion, is best described as "musical." No difficulty is presented by dramatic poetry, therefore, as to the central part of the view that has been taken. And if, as has been said, the particular conclusions arrived at in considering lyric poetry are not applicable to the drama, it must at the same time be remembered that the conditions of success in dramatic and in lyric poetry cannot be (as is sometimes thought) altogether unlike. For a lyric element is perceptible in most dramatic poets ; and the greatest among those poets who are usually thought of as lyricists have written dramas that rank next to those of the greatest dramatists.

INDIVIDUALISM AND STATE-ACTION.

ONE of the most prominent facts of contemporary politics, both theoretical and practical, is the movement away from what is called "Individualism." Philosophical writers of the most various schools, tracing their idea back to Comte or Hegel or Aristotle, or developing it independently as a psychological doctrine, insist that society is prior to man; that the individual man cannot be understood except as a social product, each man having in his mind the organised results of institutions, of law, and of the experience embodied in language.¹ Society is not to be thought of as something artificially formed by men for the purpose of doing some particular thing, but as the presupposition of all properly human activities. On the practical side, no fact is more familiar than the growing approval of the action of the State in matters that till lately the best reasoned political theory excluded from its competence. Yet there are, at the same time, influential thinkers who regard this whole movement, on its practical side, as reactionary. The principle of individual liberty, they insist, must remain for ever the only sound basis of political action; and to add to the functions of the governing power is to diminish the freedom of the individual.

Those who advocate new activities of the State, when they are not content with empirical arguments to prove that good will result in particular cases, usually fall back on one of the philosophic theories opposed to individualism. If it is urged

¹ See, on this idea, Croom Robertson's articles, "How we come by our Knowledge," and "The Physical Basis of Mind," in *Philosophical Remains*. Mr. Carveth Read, in *Mind*, vol. vi., p. 483, proposes to connect with the psychological doctrine of the "social medium" the name of G. H. Lewes.

that the action of the State interferes with individual liberty, they reply that "the older individualism" is superseded; that it is once more a part of sound political theory that "the State may do anything." The individualistic ideals of the immediate past are the outcome of philosophical individualism. The outcome of the newer doctrine is a more authoritative ideal.

In all arguments of this form there is an evident assumption. The word "individualism," as has just been indicated, is used in two distinct senses. It may mean the philosophical or psychological individualism that attempts to explain society and the State from the relations of individual men at first isolated (yet assumed to possess already all human attributes), who afterwards find their advantage in the social union and in political organisation; or it may mean the individualism that places its practical ideal in a life not authoritatively regulated from without, but developing itself spontaneously from within. These two "individualistic" doctrines have often been held by the same person: John Stuart Mill, for example, was an individualist in both senses. The views opposed to the two kinds of individualism have been similarly conjoined: Comte was an opponent of individualism in both senses. It does not follow from this, however, that either individualistic doctrine is a deduction from the other. The two meanings of the word, once distinguished, are at first sight sufficiently remote, and something more than the common name is required to prove their necessary connexion.

The doctrine opposed to philosophical individualism may no doubt be expected to have important practical consequences. Legislation may not improbably be suggested by it which had formerly no theoretical basis. So far the advocates of new kinds of State-action are in the right when they appeal to the modern theory. Where they are wrong is in dismissing as henceforth baseless all objections to State-action that are founded on appeals to individual liberty. Objections of this kind, it is now clear, will have to be met on their merits. Only two ways of meeting them are open. Either the individualistic ideal must be shown to be really bound up with

philosophical individualism, and so to disappear when this disappears; or the new kinds of legislation suggested by the modern doctrine must be proved not to be incompatible with the ideal of freedom. Before anything can be decided it is therefore necessary to determine the exact relations of each philosophical doctrine to this ideal.

First of all, then, it is clear that in either type of doctrine individual freedom is finally secure. For the individual alone has consciousness of himself. There is no "social consciousness" outside the individual mind. From this it follows that there can be no such thing as "collective happiness." The ultimate end of social life can only be attained by the individual. To the good of the individual, accordingly, social good must finally be subordinated. Now the good of each man can only be attained when all are free to seek happiness in their own way. Individual freedom, therefore, must be the ultimate end of the organisation of the State. And if it remains true that the good of society is to be preferred when it comes into conflict with individual happiness, this is because the existence and welfare of society are the condition of there being individuals at all who are able to live in freedom. In ethics this is the justification for ascribing merit to acts of self-sacrifice. In politics it is the ground of the maxim, "*Salus reipublicae suprema lex.*"

These are, in substance, the reasons given by Spinoza, and also by Mr. Herbert Spencer,—both in a sense philosophical individualists,—for the place assigned to freedom in their ideal State. The reasoning, however, does not depend on the theoretical individualism of their philosophical point of view. And if, now, we leave this final reply out of account for a moment, we shall find that the doctrine of Spinoza and of Mr. Spencer, in so far as it is philosophically individualistic, is capable of being turned against the ideal of individual freedom.

To put the argument first in a general form: the philosophical doctrine of individualism supposes that men on entering into the social union sacrifice part of the "rights," or powers of acting freely, which they had in the state of

nature, in return for protection and other advantages. Civilisation, then it would seem, must be a movement away from liberty. It will naturally consist in a gradual restriction of the freedom at first reserved, which becomes less as societies become more definitely organised. Turning to the particular doctrines in question, we find that according to Spinoza the form of political society in which there is most liberty is nearest to the "state of nature."¹ But the state of nature is a state in which there is no justice or injustice, but "all things come alike to all," because nature is yet unmodified by human law.² The state of liberty, then, it would seem, must be the lowest state. Mr. Spencer's conception of the social organism as built up out of individuals analogous to cells, at first only aggregated, afterwards becoming definitely grouped and coherent, and forming a hierarchy of parts, gives ground for a similar inference. For if, as Mr. Spencer affirms, the governing body represents the central nervous system, and if there is progress in the social organism, then its general movement ought, according to the analogy, to be in the direction of greater subordination of parts; this being the general direction of movement in the zoological series.

Of course these objections are not unanswerable, even from the point of view of philosophical individualism. From the point of view of the modern doctrine of the priority of society, however, they do not merely vanish; they turn entirely to the advantage of the "individualistic" ideal. For the individual is now conceived, not as matter to be organised, but as gradually emerging, from a primitive state in which he was only identifiable as a member of a class performing assigned functions, into definite recognition as a being with ascertained personal rights. The movement that presents itself as the characteristic movement of civilisation is not the restriction of a reserve of liberty, but the gradual growth of liberty. And by the new way of regarding society the good of the individual is more clearly seen to be something added to the good of the State, of which the good of the State is

¹ *Tractatus Theologico-Politicus*, c. xx., § 38. ² *Ibid.*, c. xix. §§ 8, 20.

only the condition. When Mr. Spencer describes society as "super-organic," that is a typical expression of philosophical individualism. According to the doctrine of the priority of society, the individual man, in so far as the common life of society assumes in him distinct personal form, must rather be regarded as "super-social."

Carried to its logical conclusion, therefore, the modern doctrine opposed to philosophical individualism, instead of destroying the individualistic ideal, restores it in a more unqualified form. "Individuality" is no longer, as Mill described it, merely "one of the elements of well-being," but is that for the sake of which social well-being is in the end to be desired.

That this is the outcome of the modern theory of the relations of society and man becomes evident in Green's "*Lectures on the Principles of Political Obligation*."^{*} According to Green, the ultimate end of political organisation is "moral freedom," that is, the freedom of the individual to become what he is capable of becoming as a moral being. To provide the conditions of moral "self-realisation" is therefore the function of the State. Now Green proceeds consistently from the basis of the anti-individualistic philosophical theory. What has been contended for is therefore strongly confirmed when he is found maintaining that freedom in some form is the final political end.

Green's definition of this end is doubtless open to the criticism that it excludes much that has hitherto been understood by freedom. Intellectual freedom, for example, was not the least important part of that which was contended for by such representatives of the older doctrine as Mill and Spinoza. How is intellectual freedom to be brought under Green's definition? The disciples of Green would probably make some such answer as this. Certain persons feel it to be "a duty," or a part of their "moral self-realisation," to attain clearness of thought on matters of general human interest. The "right" which is the correlative of this duty must therefore be secured to them by the ideal State. Con-

^{*} *Works of T. H. Green*, ed. R. L. Nettleship, vol. ii.

siderations of this kind, it may be granted, have some weight in enforcing a conclusion already arrived at. But would they be sufficient to establish this conclusion if it were questioned? It is plain that they would not. The governing powers would see in them little more than an appeal from the law of the State to personal "conscientious convictions;" and this is not held to be a sound political argument. If the liberty of thought and speech is to be permanently secure, free intellectual activity—apart from considerations as to its usefulness to the State, which will always count for something—must be seen to be a good in itself, not a mere condition of moral self-culture.

Although on this particular point Green would not have differed practically from Mill, it would be a mistake to suppose that it makes no practical difference whether we speak of "freedom" simply or of "moral freedom." There are indications in Green's political work of his approval of restrictions on personal liberty that Mill unhesitatingly condemned; and these can be traced to the limitation of his formula. The limitation, however, is due to the exclusiveness of Green's ethical attitude, not to the theory of society from which he sets out. In order to get rid of it, we have only to interpret "self-realisation" in a wider sense. The self-realisation of the individual being regarded, in accordance with Green's view, as the end for which the State exists, the political conception of freedom will necessarily be enlarged with the enlargement of the conception of individual self-realisation.¹

But if the individualistic ideal is thus re-established, does it follow that we ought to condemn all those activities of the State that are condemned by Mr. Spencer and would have been condemned by the greatest English political thinkers of the early part of the present century? What is to be said, for example, of interferences of the State with industrial competition? Does interference with the working of the industrial system constitute of itself an interference with

¹ Green himself (in the *Prolegomena to Ethics*, p. 312) recognises the difficulty that there is in the way of admitting his ethical formula as a complete expression of all that is implied in human self-realisation.

individual liberty? In short, is the commercial and industrial policy of "*laissez faire*" a corollary of the ethical and political doctrine of Milton's *Areopagitica* and Mill's *Liberty*? An explicit discussion of this question will make clear what has been gained for political philosophy by the advance of philosophic theory beyond individualism. The conclusion that is come to on this special question is, besides, itself one of the chief applications of any philosophical system of political principles.

Now we know that the word "freedom," as it is often applied, has in reality nothing to do with freedom in the sense with which we are here concerned. "Free-trade," for example, as was pointed out by Mill, is not a part of the doctrine of individual freedom. The ground of the doctrine of free-trade is not that to prevent a man receiving foreign commodities free of special imposts deprives him of that personal freedom for the sake of which the State exists, but that unrestricted international exchange of commodities is commercially the most profitable mode of exchange. To take an entirely different example: the doctrine of "a free Church in a free State" may be a very good formula for modern times; but what has been called "the liberty of the Church" is not a part of personal liberty. When the Church is struggling with the State, what is really taking place is a struggle for dominance between rival powers. And the action of a powerful corporation aiming at dominance ought not to be confounded, although it often is, with the struggle of men for individual freedom. Again, the check that has long since been put on "the right of private war" was no doubt to those who were primarily affected by it an interference with their liberty; but this kind of interference with the liberty of some, it is universally admitted, is required in the interests of the liberty of all.

This last example suggests that the case is not otherwise with freedom of commercial and industrial competition. And Mill, if we may judge by his deductions from the proposition that "trade is a social act,"¹ was of opinion that

¹ *On Liberty*, c. v.

no interference with trade as such constitutes in principle a violation of individual freedom. Freedom of commercial competition, so far as it can be maintained, is rather to be based, in Mill's view, on grounds similar to the grounds for maintaining "free-trade" in the special sense; namely, that the science of political economy shows this to be on the whole the best general condition for commercial activity. When the case is once definitely put, it seems clear that "commercial freedom," although it is often thought to be a deduction from the fundamental principle of individual liberty, is really a deduction from the principles of political economy. But political economy is an abstract science—a science that treats of certain classes of social phenomena in isolation. Any change in the theory of society as a whole necessitates therefore a corresponding change in the mode of application of economical principles.

In order to determine more exactly the theoretical position of the State with regard to commercial and industrial activity, we may best proceed from Mr. Spencer's conception of "the social organism." For this conception, notwithstanding Mr. Spencer's own "individualism," must furnish the ground for any attempt to go beyond individualism in practice. The social organism, according to Spencer, like the biological organism may be divided into certain systems of organs. There are the organs whose function is "sustentative," and the organs whose function is "protective." The former constitute the industrial organisation, the latter the military organisation; the governing body of the State representing the central nervous system. Now the system of organs that is for defence and attack in the animal organism is under much stronger and more continuous central control than the system that is for sustentation. Hence it is inferred that the same relation should exist in the social organism. Direct social consideration, it is further contended, establishes a concomitance of the growth of industrial and of general freedom. Societies normally go through a stage of "militarism" followed by one of "industrialism." In a society of the industrial type, the sustentative system, interfered with at all points

during the militant period, has emancipated itself from central control, and now forms a system working independently. The industrial type of society is in all social and political relations freer than the militant type.

It may be admitted that the association of a certain measure of growth in general freedom with a certain growth of industrialism is a plausible historical generalisation. At the same time, it is clear that the withdrawal of State-control from a group of subordinate organisations is not quite the same thing as the emancipation of the individual. And indeed where the industrial organisation is most free from central control it becomes itself a power to control the individual just as effectively as the State has ever done.

The military and industrial systems are, in truth, both alike comparable to those systems of "reflex mechanisms" conceived by modern physiology. All such mechanisms are subordinate to the total life of the organism; and although central control is of a different kind in the case of the "sustentative" functions, it is just as much present as in the case of the "protective" functions. The life of individuals in the State, according to Mr. Spencer, is comparable to the life of the cells. Now a physiologist, considering the interest of the cells, would probably find that they are free to get the greatest advantage in the common life of the organism when the particular mechanism of which they form part is well controlled by the central nervous system and balanced with others so as neither to suffer from excess nor defect of function.

The essential thing, however, is to note that the industrial system is a mechanism subservient to the general life of the State, not a group of individuals striving to develop themselves freely and only hindered by State-interference. This is recognised by Mr. Spencer himself in the following passage of the *Principles of Sociology* :—

"Were this the fit place, some pages might be added respecting a possible future social type, differing as much from the industrial as this does from the militant—a type which, having a sustaining system more fully developed than any we know at present, will use the products of industry neither for maintaining a militant organisation nor exclusively for material aggrandise-

ment; but will devote these to the carrying on of higher activities. As the contrast between the militant and industrial types is indicated by inversion of the belief that individuals exist for the benefit of the State into the belief that the State exists for the benefit of individuals; so the contrast between the industrial type and the type likely to be evolved from it, is indicated by inversion of the belief that life is for work into the belief that work is for life. But we are here concerned with inductions derived from societies that have been and are, and cannot enter upon speculations respecting societies that may be.”¹

The question here suggests itself, Cannot movement towards this future type be better promoted by conscious action through the State than by leaving the industrial type to work itself out? Mr. Spencer himself expects the transformation to take place entirely by individual effort and voluntary association. The interference of the State, he would say, can only retard it. This admission, however, seems necessary; that if the State were to attempt to promote the transformation described, it would be acting, whether rightly or wrongly, in the interests of individual freedom, not for its suppression. It would be attempting, in fact, to economise the expenditure of activities which, unless they are regulated by conscious human agency through the State, must inevitably be mechanically determined, either by the operation of natural forces or by the industrial mechanism, impersonal in its action as a natural force.

Further, it may be contended that if Mr. Spencer, in this passage, is not to be interpreted as meaning that in the future the “higher activities” will be promoted with more direct intention by the State, there is no ground for establishing a difference of possible from actual *types* of societies at all. For there have always been a few thinkers who have recognised “higher activities” than commerce and war as the true end of social life; and it would be an injustice to the societies, “militant” as well as “industrial,” of the present and the past, to say that nothing has yet been done by them to make such activities possible. Among the republics of antiquity, for example, the entire sacrifice of the true end of the State to mere military efficiency, as by the Spartan legislation, was not

¹ *Principles of Sociology*, vol. i., 3rd ed., p. 563.

universal. And, to come to modern times, is it not conceivable that the exaggerated development of an industrial as well as of a military system may tend to suppress the higher activities ; that English Industrialism as well as German Militarism may have its dangers for the real freedom of the individual ? If these dangers exist, then, to judge from the physiological analogy, defective central control must exaggerate them in the " industrial " just as excessive central control exaggerates them in the " militant " type.

Whatever application may be made of it, the conclusion is clear. State-interference with industry, whether judicious or injudicious, is in no way inconsistent with the principle of individual liberty. Always in subordination to the supreme end, the State may put checks on commercial competition, or regulate the whole industrial system as it pleases, with a view to any social good that may be regarded as an intermediate end,—say the vitality of the race or the diffusion of leisure. The condition of its effective action is adequate knowledge of industrial causes and effects as attained or attainable by scientific economics. Thus the determination of the means of bringing about a given result becomes a question of applied economical science. To ascertain whether the result itself is desirable is a question of general politics.

The mode of consideration adopted by Mill in fixing the limits of State-action, as has been already suggested, is, in spite of his theoretical individualism, not inconsistent with this conclusion. He finds, for example, that in certain special cases freedom to buy and sell commodities is a condition of personal liberty, and that it is to be maintained for that reason, not because the mechanism of exchange of commodities ought in general to be unrestricted.¹ Again, he discusses a particular case of regulation of hours of labour, and finds, on principles generally applicable, that State-regulation is justified.² But ought we not to go further than this ? Would not the conclusion arrived at justify the State in taking over the whole industrial system and working it by its collective authority ? A

¹ *On Liberty*, c. v.

² *Ibid.*, c. iv.

proper apportionment by the State of those works that are necessary for the maintenance of the life of the community might, as some socialistic thinkers have contended, secure the greatest amount of liberty on the whole; and thus the only possible objection is obviated.

The conclusion, however, that the State may justifiably interfere with the industrial system does not imply that it ought always to interfere. There is, first, the condition that it should have adequate knowledge. The admissibility of State-socialism, then, is reduced (if we assume it to be otherwise consistent with freedom) to a question of applied economics. Now, one possibility is that economical science may prove the interference of the State to be in all cases injurious. This is the view of Mr. Spencer and of many "orthodox" economists. A second possibility is that in the hands of its later students it may demonstrate the socialistic position. But there is also this third possibility: that while the older economists have shown the interference of the State to be in many cases injurious, there are still cases in which State-action may be proved from the basis of economical science to be effective for other purposes than "negative regulation."

Political economy, so far as it has been scientifically treated, probably gives sufficient grounds for concluding against the extreme socialistic position that the community ought to assume direct command of the whole industrial system. The scientific character of the older economics is confirmed by the influence of its generalisations on other sciences. The stimulus its doctrine of the division of labour gave to physiology and the influence of Malthus on Darwin are well known. Mr. Spencer's biological analogy, again, confirms both the procedure and the results of "abstract" political economy: its procedure, because the industrial organisation of society is found to be analogous to a subordinate system of reflex mechanisms capable of being studied, up to a certain point, separately from the rest of the organism; its results, because the industrial organisation is found to be analogous to that system of reflex mechanisms which normally works with least

central control. These results, if accepted, limit very much the prospects of effective State-action. At the same time, both Mr. Spencer's analogy and economic science still leave open the possibility that actions from the centre, not minutely regulative as in the case of a military system, but regulative in a general way, may subserve the higher interests of the State. What prevents such possibilities from being considered is on one side the temporary eclipse of scientific economics, on the other a traditional opinion that all *positive* applications of economic science by the State are inconsistent with individual freedom. The eclipse of economics will probably last no longer than the unjustified identification of the pure science, by some of its exponents, with a discredited industrial policy. It is against this policy, and not against the science itself, that a prejudice still exists. The objection made to increased State-action by those who are unwilling to sacrifice individual freedom, and the neglect to answer it on the part of those who advocate new activities of the State, are alike due to identification of the two senses of the word "individualism." On each side, therefore, we may find ground of hope. For within the limits of science there are always chances of discovery both of new laws and new applications of old ones; and, as has been seen, the organisation of industry in the higher interests of the State is in no way essentially opposed to individual freedom, but is rather a necessary condition of freedom.

VOLKMANN'S PSYCHOLOGY.

THE articles on Herbart and his successors, contributed by Mr. Stout to *Mind* during the years 1888-9, have furnished English students of psychology with a convenient introduction to the work of the school which, in Germany, has the best claim to represent the science in its whole range. The generality of Mr. Stout's plan of treatment, of course, precluded him from going into detailed exposition of the work of particular writers of the Herbartian school. It has, therefore, seemed desirable that some more special account should be given of Volkmann's *Lehrbuch der Psychologie*.¹ For this treatise (see *Mind*, x. 146, 476, and Mr. Stout's article on "The Psychological Work of Herbart's Disciples" in xiv. 353 ff.), while it is a representative work of the school, is also much more. As the most comprehensive psychological treatise yet written, and as at once systematic and historical, it is of especial importance to English students; for systematic comprehensiveness and historical treatment are less frequent in England than in Germany, and are, it will be allowed, seen at their best in the best work of German writers.

There are, indeed, some English psychologists who go much beyond this allowance; who are seeking to reform—if not to revolutionise—English psychology by ideas derived from the German schools. Along with these, Mr. Stout, in his com-

¹ *Lehrbuch der Psychologie vom Standpunkte des Realismus und nach genetischer Methode.* Von Ph. Dr. Wilhelm Volkmann Ritter von Volkmar, weil. o. ö. Professor der Philosophie an der Universität zu Prag, &c. *Des Grundrisses der Psychologie dritte sehr vermehrte Auflage.* 2 Bände. Cöthen: O. Schulze, 1884, 1885.

parison of Herbart with the English psychologists and with Beneke (*Mind*, xiv. 1 ff.), appears to class himself, when he insists that the Herbartians have made important advances of general theory on English Associationism. Before beginning the exposition of Volkmann's great treatise, it will, accordingly, be well to consider briefly how far we must accept or reject Mr. Stout's contentions. In this way, it will, at least, be made clear from what point of view the present exposition proceeds.

Of the relation between psychology and metaphysics, Mr. Stout appears to take the English rather than the Herbartian view. He, at least, makes no attempt to uphold Herbart's position that the fundamental principles of psychology admit of deduction from a theory of the nature of the soul. The nature of the soul, he would rather appear to hold, can only be determined after the psychological formation of the Ego in its distinction from the Non-ego has been investigated genetically. And, if he does not definitely proclaim his agreement with the position arrived at by Waitz, for example, within the Herbartian school, that metaphysics ought to be founded on psychology, and not psychology on metaphysics, there is nothing in his articles inconsistent with this view. Now this is understood to be the traditional English position. It is not at this point then, according to Mr. Stout, that any reform of English psychology is needed.

The most obvious point of contact between English Associationism and the Herbartian psychology is rejection of the "Faculty-doctrine." Here Mr. Stout thinks the Herbartians are a little more consistent than the Associationists. In his article in *Mind*, No 53, however, he, to a certain extent, mixes up the successors of Locke with the followers of Reid. But to show that there are traces of the Faculty-doctrine in a follower of Reid is not to show that genuine Associationism is affected by it. No doubt, it may be shown that Associational psychologists speak from time to time of mental "powers" and "faculties"; but, as Mr. Stout himself allows, these terms are used in a literary and not in a scientific manner. The English psychologists have seen that it is not necessary to be

always parading their scientific apparatus. When they are merely describing mental processes, and do not for the moment aim at assigning their laws, they are content to use the ordinary terms of description. From the first, English psychology avoided hypostasising the names of groups of mental phenomena into causes of those phenomena. This—which is the “Faculty-doctrine”—the Germans fell into, because their psychology was for a long time simply a branch of the Scholastic philosophy which continued to reign in Germany after the opening of the modern period. For Germany—though not for Europe—Leibniz made the first important advance beyond the Faculty-doctrine. The Herbartians, by much laborious polemic, were at length able to dismiss it completely; but they had been preceded by the English psychologists, who had avoided it by the instinct of genius; and, in the end, the Herbartian psychology could not be clearer of the assumption of “faculties” as hypothetical causes than English psychology, which is absolutely clear of it.

Where Mr. Stout seems chiefly to think the Herbartian psychology superior to Association-psychology is, however, in what he regards as its more developed view of the “psychological mechanism.” Herbart, he contends, has given a fuller account of the mind as a “mechanical system” than the Associationists. He does not apparently accept all Herbart’s laws of “interaction of presentations,” or his mathematical treatment of this interaction; but he seems to think that the mere attempt at mathematico-mechanical treatment was, scientifically, an advance on English Associationism. If, however, the Herbartian attempt to explain the order and succession of mental occurrences did not really succeed except in so far as it involved laws of association (stated in a peculiar manner), it is difficult to see where there is any advance. And Mr. Stout does not in effect show that the Herbartians by their “mechanical” conception have been able to do anything beyond what has been done by means of the laws of association as ordinarily stated. The conception of the laws of mind as constituting a “mechanical system,” on which he lays so much stress, is really a defect of Herbartianism, and not a

merit. For, in fact, the mind is not a "mechanical system." This being so, the psychologists who do not call it one have an advantage over those who do, if only they can maintain equally well the scientific character of psychology. That the term "psychological mechanism" is a rather unfortunate one has been seen by members of the Herbartian school itself. Waitz, for example, in his *Grundlegung der Psychologie*, has very well put the objections to it. When we speak of "mechanism," he says (ed. 1846, pp. 140-1), we are accustomed to think of the laws of pressure and impact of masses of matter. Hence the term "psychical mechanism" is to be avoided. We should rather speak of a thoroughgoing determination of the mental life according to law, running parallel with the "organic and mechanical" determination of the corporeal world. For processes in the corporeal world itself, as Waitz goes on to indicate (p. 141 n.), are not all capable of adequate expression in terms of mechanism. There is a "phenomenal" opposition of the organic and the mechanical.¹ Now English psychology, while insisting on the determination of mental phenomena, keeps the distinction perfectly clear between determination according to law and mechanical determination, which is only one particular expression of scientific law. For its "laws of association" are always understood to be laws of mind, and not laws of material change—whatever material changes may be the concomitants of mental associations. Thus, instead of English psychology needing a reform on Herbartian principles, the Herbartian psychology itself, by an internal advance, has tended to the English position.

But, it may be said, the really important point in the doctrine of the "psychological mechanism," and that which constitutes its advance on English Associationism, is its theory of the interaction of contemporaneous presentations,

¹ Waitz's distinction might be applied within the organism, some parts of which have a kind of external "mechanical" relation to more "organic" parts. If we apply material analogies to mind, we may distinguish the more "mechanical" from the more "organic" mental processes. These may be supposed to be parallel respectively to corresponding processes in the organism or the central nervous system. In this way we get a conception not altogether unlike the Stoical conception of the *ἡγεμονικόν*.

and of the existence of "unconscious" presentations among these. That this is a very characteristic point of Herbartianism may be admitted. And as the idea of unconscious or sub-conscious presentations was derived by Herbart from Leibniz,¹ it may plausibly be represented as a distinctive idea of German psychology. An investigation of the relations of Leibniz to his French or English predecessors might indeed show that absolute priority in the expression of the idea does not belong to him; but it remains true that it has hitherto been more elaborately worked out in German psychology than elsewhere. At a later period, however, the physiologists generally would seem to have come upon it independently of influences from any psychological school. It has certainly made its way into modern English thought apart from Herbartian influences; so that, whatever may be its history, we do not now need to go to Germany for the idea.

The notion of a mental "continuum" and its "differentiation," which to many seems so important an advance of the latest English psychology, whether it is specially Herbartian (as Mr. Stout contends) or not, has been arrived at, so far as it has any scientific value, on the ground of purely English psychology. Mr. Spencer's "vivid aggregate never known to be broken" and "faint aggregate never known to be broken" seem at least to be the clearest possible expression for the "presentation-continuum" and the "memory-continuum." These are represented as arising psychologically by differentiation; and we are told that "each set of states has among its members both a simultaneous cohesion and a serial cohesion" (*Psychology*, § 453). In this proposition it would be difficult to show what is wanting to the idea of continuity. If it is said that expressions such as "aggregate" and "set of states" show that Mr. Spencer is still at "the abstract point of view of English Associationism," it can only be replied (as it has been replied to similar arguments) that this "abstraction" is scientifically indispensable, and that Herbartianism proves its

¹ See, for a detailed account of its derivation, a recent memoir by Dr. Johannes Barchudarian, "Inwiefern ist Leibniz in der Psychologie ein Vorgänger Herbarts" (*Mind*, No. 57, p. 146).

scientific character by making similar abstractions. For the Herbartians, in the main, work with sensational elements, from the relations of which they proceed to derive the actual continuity of the mental life.

What can really be maintained on behalf of the Herbartian psychology is that it is a genuinely scientific system, overburdened with mechanism as compared with English psychology, but more systematic and more elaborate. Volkmann's work adds to this the merit of being also comprehensively historical. The historical part of the treatise is a summary, equally valuable for reading and for reference, but hardly admitting of further condensation. A mere indication of its value must suffice. For the exposition of the systematic portions of the work, the best rule to adopt—from the point of view here taken—will be to reduce the Herbartian explanations as far as possible to their effective part by clearing away the superfluous machinery (including the term “psychological mechanism” itself). When thus reduced, they become associationist explanations. A general idea of Volkmann's actual procedure, however, must at the same time be given; and, to give this, some account must be included of his metaphysical deductions and of his specially Herbartian statements of psychological laws, even at the risk of occasionally repeating what Mr. Stout has already set forth. The order of exposition will differ little from that of Volkmann himself. Since, in accordance with the principles of his school, he aims at employing in his first volume chiefly the “synthetic,” in his second chiefly the “analytic,” mode of treatment, it will be convenient to finish the exposition of volume i. in a first, and to deal with volume ii. in a second, section. There is, besides, as Volkmann points out, a natural division of subject-matter between the two volumes, connected, as will be seen, with the difference of treatment.

I.

Psychology, according to the Herbartian view, is neither a purely “speculative” nor a purely “empirical” science. It has now reached the stage—towards which all sciences tend—

in which it can be constructed both from experience and from metaphysical principles. It is empirical in that it finds its materials in experience—its chief experiential source being self-observation; speculative in that its laws are deduced from a metaphysical doctrine as to the nature of the soul. Its method is "the genetic method." That is to say, it traces the origin of mental phenomena from their elements according to the laws speculatively deduced. It is "synthetic" or "analytic" according as its explanations start with general laws and proceed to the construction of the concrete phenomenon, or start with this last as a problem and proceed to its resolution into those constituent elements and relations that have been already recognised as grounds of explanation. Thus the whole of psychology might conceivably be treated either synthetically or analytically; but actually the synthetic treatment is best adapted to the simpler, the analytic to the more complex, phenomena.

By "the standpoint of Realism," referred to in the title of Volkmann's work, we are to understand, not the realistic doctrine of the external world, but the Herbartian ontology, derived from the Monadism of Leibniz and expressly connected with it both by Herbart and his disciples. The Herbartian doctrine is called Realism as affirming a plurality of real beings, which form the ground both of mechanical and mental occurrence. For this doctrine, the soul is the simple and unitary real being that is "the bearer of presentations." The assumption of its unity and simplicity is required to explain the unity of consciousness as revealed in self-observation. To explain the origin of the plurality of presentations given along with the unity of consciousness, we have to think of the soul as connected in a system with other real beings. Such a system is formed by the real beings composing that which, physically viewed, is the organism. The interaction of these with the soul, or central real being of the system, is the ground of "presentation." When we abstract from the connexion of the soul with other simple beings and regard it merely as the simple being that is the bearer of presentations, we get the conception of "mind." The "mind," as such, is outside all

relations of space and time. The "soul" is in a certain body, and is in that time in which its presentations are produced.

The question of "the seat of the soul," in the sense in which it is permissible, is a physiological question. For its solution Volkmann adopts the physiological hypothesis of a "focus" of the nervous system, in which not the nerve-fibres themselves but all nerve-excitations meet—"a (fixed or changing) point of convergence of all waves of excitation." At this central point of nervous activity we have to place the "bearer of presentations." Thus the physiological and the metaphysical views are brought together. The point of convergence of excitations in the brain may be spoken of as "the seat of the soul." On the ground of a continuous series of analogies a soul is to be assumed in the lowest animals, but not in plants, these not being sufficiently centralised.

States of the soul, that is, presentations, necessarily arise in consequence of its interaction with the system of real beings constituting the organism. A "presentation" may be defined as "the simple state of the soul in which this brings to expression its opposition to the reals with which it finds itself in immediate or mediate connexion." The presentation (*Vorstellung*) is related to presentative activity (*Vorstellen*) as the product to the process. The presentation with its presentative activity is not to be thought of as something separate from the soul. On the contrary, the soul is that which is active in the presentative activity, and of which the presentation is the development. The special quality of a presentation—within its general psychical quality, which belongs to it as a state of the soul—depends on the quality of that real element whose connexion with the soul occasions the presentation. This dependence, however, is no "mirroring." The true conception of the presentation lies between two opposite errors—that which makes it a mirroring of the external thing, and that which makes it a self-evolution of the mind or of a mental "power."

A presentation, having once come into existence in consequence of an entrance of real beings into a certain combina-

tion, continues to exist after the disappearance of this combination. One presentative activity may fall into conflict with another and become "bound," but the presentation is not lost to the soul. It only has its activity suspended so long as it is "bound." The "paralysed" activity has been transformed into presentative "effort," which may at any time overcome the obstacles that temporarily bind it.

The conception of the Presentation as arrived at metaphysically coincides with that of a perfectly simple Sensation. But while sensation as theoretically deduced is a state developed by the soul on occasion of the stimulus conveyed by a single primitive fibre, sensation as empirically observed is always a complex total state proceeding from numerous elements opposing or balancing one another. We must call the relatively complex states beyond which experience does not carry us "presentations" or sensations; making at the same time the reservation which the metaphysical deduction of the true presentation as simple state requires.

Sensation as presentation has its "content" or "quality"; as presentative activity its "intensity" or "quantity"; as union of elementary states its "tone," determined by the interaction of its elements. The content of a sensation corresponds to but does not resemble the quality of the stimulus that is its occasion. The quality of the stimulus has for its conditions on one side objects with changing qualities, on the other side an organ of approximately constant character. Among the psychological circumstances influencing intensity of sensation is attention; among the physiological circumstances, prolongation of the stimulus and diffusion of it over the organ, freshness of the organ, &c. By the tone of a sensation is meant the fact of its appearance with the consciousness of "furtherance" or "hindrance." The consciousness of hindrance is pain in its various degrees; the consciousness of furtherance pleasure. Hindrance and furtherance are to be understood with reference to the relation between the stimulus and the existing state of "tension," which depends on interactions within the organism. What is hindered or furthered is the resolution of a tension. Since every furtherance sup-

poses a previous hindrance, every "resolution" a previous tension, pain is the primary, pleasure only the secondary, phenomenon of tone. Thus consciousness of tone is not consciousness of a particular felt content, but is a consciousness of the process of feeling as determined by interaction of one element with others. Between determinateness of content and strength of tone there is an inverse relation. There are no absolutely toneless, as there are no absolutely contentless, sensations.

Under the head of intensity of sensation, Volkmann gives some account of the investigations of psychophysics. Proceeding to discuss in detail the "kinds of sensations" as determined by their reception from different sense-organs, he describes in order the results attained as regards Sight, Hearing, Smell, Taste, Pressure and Contact, Muscular Sense, Sense of Temperature (Heat and Cold), Corporal Sense and Cœnæsthesis. The "tactile sense" is found to be properly a combination of two sensations of different classes, *viz.*, pressure and muscular sensation. It is, however, entitled to rank separately, both on the psychological ground of the intimate union of the two heterogeneous sensational qualities, and on the physiological ground that the parts most sensitive to touch do not coincide with the parts most sensitive to pressure. Sight and touch are characterised by comparative slowness of tone. The muscular sensation is the "feeling of innervation." Physiologists, not altogether wrongly, oftener speak of "muscular feelings" (*Muskelgefühle*) than of "muscular sensations" (*Muskelempfindungen*); for the sensation, as a complex, has something emotional in it. The tone of the muscular sense, that is to say, goes beyond the limits of the ordinary "tone of a sensation," and approaches "feeling" properly so-called. The "corporal sense" includes a great number of disparate senses, characterised by prominent tone even when their intensity is low. It may, perhaps, be an aggregate of residues, retarded in development, from the primitive total sensibility out of which the special senses have become differentiated. The common organic sense, or cœnæsthesis—which ought to be called "organic feeling" rather than "organic sensation"—

is the total impression of all contemporaneous sensations. It consists of unlocalised corporal sensations (sometimes identified with it); sensations of temperature and pressure so far as they are less toned and appear in greater masses; muscular sensations so far as they remain isolated; sensations of tension or "disposition" of the organs of sight and smell; odours and tastes and (rare) colour- and sound-complexes that are brought into relation with no determinate object of the external world. The common organic feeling is "the psychical expression of the life of the body," "the somatic basis for the unity of self-consciousness."

Movements, *i.e.*, bodily motions conditioned by stimuli of motor fibres, are divisible into Actions, Instinctive Movements and Reflex Movements. The ground of excitation of an action is a determinate act of will; of an instinctive movement, some other psychical activity; of a reflex movement, some nervous stimulus outside the soul. An instinctive movement, accordingly, may have for its stimulus either (1) a presentation or (2) a feeling. Since presentations can only set movements going by the intermediation of associated muscular sensations, and not, like feelings, directly; and since the muscular sense has itself the character of a feeling; the difference between the two kinds of instinctive movement is not "specific." The second class of instinctive movements shades off into reflex movements. The explanation of the first is essentially similar to that of voluntary movements; the essential thing in each case being the production of appropriate muscular feelings in sufficient strength and precision. Voluntary, instinctive and reflex movements, as Volkmann shows after earlier psychologists, may be transformed into one another in either direction.

Fuller treatment of Instinct as well as of Will is postponed to a later division of the work; but as a supplement to his account of the motor elements of the mental life, Volkmann sets forth the theory of the origin of Language. Words, he finds, were originally the product of an instinctive movement of the second kind, that is, of the kind that has feeling for its stimulus. A sound uttered under the influence of an emotion,

as soon as it calls up in the mind of the hearer the idea that is in the mind of the speaker, becomes a true "word," that is, a sign, having hitherto been a mere "natural sound." Emotion, having performed its part in facilitating utterance and understanding, is eliminated, and the instinctive movement exchanges the form of the second class for that of the first. Finally, as the various series of ideas and movements fall under the dominion of the will, the utterance of words becomes an "action." Before the first, or "pathognomic," period of word-formation is completed, the second, or "onomatopoetic," in which sounds that are heard influence the formation of words, has begun. After the first two periods—the period of the "natural sound" evoked by something that excites emotion and the period of "imitation of nature"—comes the third, which has been called the "characterising" period. Its activity consists in finding the sides of new impressions by which they may be brought under the categories of old, already fixed presentations. It is further considered by Volkmann in his view of the Concept.¹

The Herbartian theory of "the interaction of presentations" is in essentials adopted by Volkmann, but not without differences of theory and of terminology. Volkmann, for example, speaks of the "fusion" of heterogeneous presentations, while Herbart calls their union "complication," confining the term "fusion" to the union of homogeneous presentations. The term "threshold" employed by Herbart as a name for the limit below which presentations sink when they become "obscured," Volkmann rejects. He maintains the ideas of "mechanical" interaction of presentations and of the application of mathematics to this interaction; but he is willing to allow that the results of mathematical calculation are not always empirically verified. The concluding section

¹ With Volkmann's acceptance of the position that the uttered sound becomes a "word" from the moment when it is *understood* may be contrasted Wundt's position (*Phys. Psych.* 2nd ed., vol. ii. p. 433) that language is constituted by the *intention* to convey a certain meaning; that it exists from the moment when the original "impulsive movement" becomes a voluntary movement.

of the first volume contains, indeed, considerable admissions as to the Herbartian "mathematical psychology," and may almost be taken as a confession that the experiment of applying mathematical calculation to the interaction of mental states, though worth trying, has not yielded the definite and verifiable results that were looked for.

The starting-point of the theory of Interaction is the notion of "a plurality of simultaneous presentations." The simplicity of the soul, it is maintained, is not inconsistent with the separate origin of simultaneous presentations; but it is quite irreconcilable with their continued separate existence. The fundamental law of the interaction of presentations, therefore, is: Simultaneous presentations fuse. Presentations may be either "like" or "opposite" or "heterogeneous." The fusion of like and of heterogeneous presentations offers no difficulty. The difficulty is to explain the fusion of opposite presentations. Its solution is contained in the proposition: Simultaneous opposite presentations arrest one another and then fuse; that is to say, they put out of action so much of their presentative activity as opposes union, and unite the rest in a total act. This leads to the Herbartian theory of the mutual "arrest" of opposite presentations and of the fusion of "residues." The application of mathematics in working out the consequences of arrests and fusions depends on the distinction of intensity (or quantity) from quality of sensation, and on the numerical expression of "degree of contrariety" as well as of intensity. To consciousness, "arrest" announces itself as diminution in clearness of presentation. The degree of arrest is measured by degree of diminution of clearness. When the whole activity of a presentation is bound, the presentation is said to be "obscured." The intensities and degrees of contrariety of the interacting presentations being known, and the relations of these quantities to the total arrest and to the arrest falling on each separate presentative activity having been formulated, the conditions of obscuration are calculable. Sensations, since they are composed of simple states, are determined in their internal as well as (approximately) in their external relations, according to the laws of

fusion and arrest. Simultaneous heterogeneous presentations fuse into a total presentation—the “complex idea” (as Volkmann remarks) of English psychology. This means that their presentative activity becomes a “total presentative activity” while they themselves persist in their qualities and degrees of clearness. Of total presentations those are said to be “complete” (*vollkommen*) whose constituent partial activities enter into union unarrested. When these have been deprived of some of their intensity by arrests, the total presentation is said to be “incomplete” (*unvollkommen*). Under favourable external circumstances the incomplete total presentation may become complete. Partial presentations of the same total presentation are to one another “aids”; that is to say, they support one another in the bearing of the arrest. The gain by fusion is greater for the weaker than for the stronger partial presentations of the same total presentation. Older presentation-complexes, in consequence of their “internal rest and consolidation,” have an advantage over presentations that have just entered consciousness.

Arrest and fusion are, in reality, processes. They do not take place all at once, but gradually. The presentation, therefore—or rather the presentative activity—is said to have a “motion.” This admits of only two directions, *viz.*, “rising” and “sinking.” All motions of presentations take place between the highest point of the original activity and zero; the possibility of rising only exists for a presentation that has sunk below its original intensity. Comparison of the motion of points in space with the “motion” of intensities of presentative activity shows that the velocity in the latter case is always to be thought of as diminishing. The motion of a presentation can be completed in no finite time, but a presentation may be obscured in a finite time. For if the lowest point to which the presentation must sink, in order to reach the limit of its motion, is below the limit of its activity—that is to say, if its share in the arrest is greater than its own original activity—then the presentation needs, indeed, an infinite time to reach the lower limit of its motion, but passes its own limit of intensity, the horizon of its consciousness, in

a finite time. The laws of motion naturally become more complicated when presentations are supposed to arrive successively, instead of simultaneously. A presentation may be kept indefinitely near its maximum by the persistence of a physical stimulus or by the activity of psychical "aids." The term "fixed presentation" is applied to a sensation indefinitely near its maximum and sustained at this height by persistence of the stimulus.

At the end of his treatment of the interaction of presentations, Volkmann has a section on Sleep. The somatic conditions of sleep, he finds, are (1) isolation of the brain from the other parts of the nervous system, both on the side of external stimuli and on the side of innervation, and (2) disengagement of peculiar corporal sensations in the soul. These sensations, marked by low intensity, great number, increasing "fixation" and a high degree of contrariety to homogeneous presentations, exercise pressure on these directly and indirectly on all others; thus adding their positive influence to the negative influence of isolation in bringing about the general obscuring of consciousness characteristic of sleep. In sleep as a process five stages are to be distinguished—"sleepiness, going to sleep, deep sleep, sleep with dreams, waking." In deep sleep "the light of consciousness has scattered itself upon so many atoms that it becomes in each a vanishing quantity." The subject of dreams is resumed after the principles of the theory of reproduced presentations have been set forth.

The return of the obscured presentation into consciousness is called its Reproduction. The reproduction of a presentation takes place by suppression of the arrest that obscured it; and thus either "immediately," by its own force, on the disappearance of an opposite presentation, or "mediately," by the force of an aid, in spite of opposition. As the mediate reproduction of one presentation has the immediate reproduction of another, namely, the "aid," for its presupposition, immediate reproduction is the simpler case.

There are two forms of immediate reproduction. The first form occurs when a presentation is reproduced, not because

of the entrance of a new presentation which removes the arrest, but because of the disappearance of the opposition from other causes. This disappearance may be due either to withdrawal of a stimulus or to cessation of an act of voluntary attention. In either case, the returning presentation is called a "freely ascending presentation." On account of its velocity's becoming gradually less in the measure of its ascent, the freely ascending presentation never quite reaches its maximum height. It usually remains far below the maximum. The second form of immediate reproduction has its ground in removal of the opposition by the entrance of a new presentation qualitatively like the obscured presentation. The arrest due to opposition being removed, the obscured presentation ascends by its own force.

The second of the two forms of immediate reproduction may be found by self-observation in the phenomena of recognition. The theory of freely ascending presentations, on the other hand, contributes to the explanation of reverie, and enables us to take up again the thread of the phenomena of sleep at the point where it was dropped. When the "somatic pressure"—the arrest due to the corporal sensations disengaged during sleep—is taken off a limited region of the psychical life, the obscured presentations belonging to that region are set free to ascend. Their ascent constitutes a Dream. Dreaming is thus a partial waking, which ends with complete waking when the pressure taken off one circle of presentations is taken off all. In waking life, on the other hand, to be completely given over to a single circle of presentations has something dreamlike in it. Another element of dreaming is introduced by those corporal sensations of which the stimuli break through the isolation of the central organs from the periphery. This breaking-through disturbs the motions of the free presentations, and is most prominent in morning-sleep. Dreaming, according to Volkmann, has a certain advantage over the waking state in its internal unity; the presentations of a dream appearing in their intrinsic relations, and detached from the accidents of daily life. This, in his view, explains the "prophetic significance" of some

dreams. At the same time, by reason that the pressure of cœnæsthesia is only taken off a single circle of presentations, dreams have a characteristic one-sidedness, resembling the life of animals, with their more limited range of sensibility as compared with man, and the predominance in them of particular senses. Somnambulism is best explained as a morbid exaggeration of this one-sidedness.

The ascent of one presentation—however determined—has for its consequence the raising of all presentations fused with it. Thus, when one partial presentation is immediately reproduced, the mediate reproduction of the total presentation follows. In general, the mediate form of reproduction is behind the immediate as regards both velocity and height; the more so as the mediately reproduced presentation ascends not in consequence of the yielding opposition but in spite of the opposition that has not yielded, and as the arrest that is thus unavoidable lowers both the velocity of ascent and the maximum height. When both modes of reproduction work together to raise the same presentation, the presentation ascends not with the accumulated velocities but with that which is the greater, because in the fulfilment of one motion satisfaction is implicitly given to the demands of the other. The law of mediate reproduction furnishes the basis for the theory of “signs”; for sign and thing signified are heterogeneous; what holds them together is “fusion.”

The correspondence of the theory expounded above to the doctrine of Association of Ideas is pointed out by Volkmann, and is indeed sufficiently evident. The second form of “immediate reproduction” is of course “association by resemblance,” while “mediate reproduction” is “association by contiguity.” Volkmann contends that the Herbartian method of formulation is preferable to the English, because it begins with the problem of obscuration, instead of inquiring into the conditions of the return of the presentation before those of its disappearance have been understood.

After setting forth the general laws of the reproduction of presentations, Volkmann enters into the doctrine of the “presentation-series”—defined as “a presentation-complex

which, in consequence of orderly fusions of its constituent parts, possesses the capability of raising these, during their reproduction in determinate order, to their full degrees of clearness." The serial form may be described generally as the form in which successive presentations are reproduced when their succession is not too slow, and when there is not too great want of uniformity in the qualitative relations of the successive terms. Simultaneous presentations, as well as presentations originally in serial order, may assume, when reproduced, the form of a series. For this to take place, there must be regular gradation of degrees of fusion ; and this appears in similar presentations when, with identical quantity, their qualities are separated by a regular gradation of degrees of contrariety. The form of a series is assumed, for example, by colours, tone-qualities and logical species of the same genus. Series of which the repetition merely by reproduction is possible become shortened with time ; series that have to be reconstructed on each repetition become lengthened by the taking in of details at first overlooked.

Each pair of fused presentations may be compared, as a structural unit, to the organic cell. Similarly, the presentation-series may be compared to the organic fibre. Series, like single presentations, arrest one another so far as they are opposed, and support one another so far as they are like or fused. A series may consist of subordinate series. Series are "divergent" when they have the first term in common, "convergent" when they have the last term in common ; when they have an intermediate term in common they are said to "cross." If a series leads the way to divergent series, it is said to "divide" ; if it follows the convergence of series, the converging series are said to have "united" in it. By the insertion of intermediate series, crossing may be avoided. Series may become interwoven into "tissues." Examples of such interwoven series are the arrangements of colour-series in a surface, of concept-series in a science, of the series of particular sciences in the scheme of universal knowledge. These "tissues" made up of presentation-series are comparable to the tissues of an organism.

In the course of the treatment of Series, an explanation is given of the fact that the longer a presentation has been obscured the more difficult it is to reproduce. The explanation is this: Voluntary reproduction does not as a rule come directly upon the presentation to be reproduced, but has to call it up by series of "aids." Now, the longer the time during which the presentation has been obscured, the greater is likely to be the length and complication of the series of steps by which it must be arrived at; and so the more difficult it is to reproduce. For immediate reproduction, the length of the period of obscurity is irrelevant. Hence, if voluntary reproduction can take this form, there is no difficulty depending on the length of time that has elapsed since the presentation was obscured.

"Sensation" and "reproduction," as has been seen, are names given to different periods in the history of the same presentation. The presentation is called a sensation from its development to its first obscuration, a reproduction from its return into consciousness to its next obscuration. What, then, are the empirical characters by which these phases of the presentation are distinguished? In other words, what is it, psychologically, that the continued presence of the somatic stimulus confers upon the sensation? The difference between sensation and reproduction cannot be in the quality or content, which is the same in the two cases. The "weakness" of the reproduction in comparison with the sensation, its falling off in clearness, which was taken by Hume as the criterion, is not sufficient. It is, in Volkmann's view, the greater tone of the sensation as compared with the reproduction that constitutes its most distinctive character. In the reproduction, the tone, so far as it depends on relations of the elements of the sensation to one another, has almost disappeared. The reproduced presentation, as feeling, is no longer pleasant or unpleasant, but indifferent, until it has formed for itself a new pleasurable or non-pleasurable feeling by interaction with other presentations. If we call that property of the sensation that proceeds immediately from its tone, or mediately from accompanying organic sensations, its

'liveliness,' then want or diminution of liveliness is the criterion of reproduction as opposed to sensation. Liveliness is to a certain extent communicated to the presentations reproduced by a sensation. A second character distinguishing sensation from reproduction is that the sensation is "fixed" by the stimulus, that it persists in opposition to the will. Only of secondary importance for the distinction of sensation from reproduction, this character becomes of more importance for the distinction of the reproduction of a sensation from the reproduction of a reproduction.

The account of reproduction as a psychological process concludes with a discussion of Memory and Imagination. These, Volkmann points out, are not to be viewed as "total forces" by which "the mind" calls up particular phenomena. The question for the psychologist is, What are the real processes of interaction of mental elements to which the terms are, respectively, applicable? On any view, the contrast between (1) the tendency for presentations to be preserved in their original integrity and fusions, and (2) the tendency for them to be set free from their old combinations and placed in new ones, has to be recognised. From the point of view of the theory of interaction, therefore, every presentation may be said to have its "memory" or its "imagination," according as it strives after the recovery of old or the formation of new combinations. Traditional terminology being used, memory may be divided into "memory in the narrower sense," or the striving of presentations after immediate reproduction, and "recollection," or the effort of a presentation to bring others to mediate reproduction; both being included under "memory in the wider sense." The classification (proceeding from Kant) of memory into "judicious," "ingenious" and "mechanical" also admits of interpretation in the Herbartian sense. It is especially in the fusions of "freely ascending presentations" with one another that the new combinations of imagination are formed. The characteristic of imagination is "newness"; but a whole becomes new either by leaving aside of old or by addition of new parts or by union of both processes. This gives the division of imagination into "abstract-

ing," "determining" and "combining." Imagination does not receive its true life and colouring till it comes under the influence of emotions and desires. Under this influence it rises into "Phantasy."

II.

Having dealt synthetically with the simpler mental processes as deduced from "laws of interaction" applied to the elements of mind, Volkmann goes on, in his second volume, to deal analytically with actual mind in its complexity. First he seeks to resolve into their elements the mental "forms" of Time and Space, and the Perceptions that appear under those forms. Next, the psychological differentiation of the Ego from the Non-ego is traced out. Lastly, the phases of developed mind known as Thought, Feeling, Desire and Will, are marked off from one another and successively analysed from the points of view already gained.

The psychological problem of Time and Space, as stated by Volkmann, is, How are the time- and space-forms developed out of presentations? The succession of presentations, he premises in dealing with time, does not itself constitute the presentation of succession. Primarily, he finds, the activity that brings succession to consciousness is the presenting of a sensation in its contrast to a reproduction. The reproduction "strives against" the present sensation, and this striving is accompanied by desire. Through the feelings of "no more" and "not yet," we become conscious of time. The source of the strength both of these feelings and of the consciousness of time involved in them is the desire for a present satisfaction of sense not given in the mere reproduction.

As in successive presentation there is originally no presentation of succession, so in the mere consciousness of the present as such there is no presentation of duration. We only come to know that the present persists by its striving against an increasing tension of the future. The feeling of "still there" is the feeling of duration.

Different "time-series" stand at first out of relation to one

another; but from the "full" the "empty" time-series is formed by interaction of different series; and this last is produced beyond all limits so as to become what is called "the idea of eternity," which is in reality the *attempt* to represent in an intuition the "before-and-after" that constitutes time. At length, by hypostasising the form that we find everywhere in the perceptions of the "external" as of the "internal" sense, we get "time-in-itself" or "objective time." The time-series, which was at first *a* time, then *my* time, becomes at last *Time*. The time-series, originally discrete, by the assumption of the objective character becomes a continuum.

Coexistence of presentations does not immediately give the presentation of coexistence, any more than succession of presentations gives the presentation of succession. Presentations, indeed, in order to be presented "beside one another," must be actually not "beside one another" (*neben einander*) but "in one another" (*in einander*) as "simultaneous states of the same simple being." In spatial presentation, different presentations are united in the same act, yet distinguished. To be spatially presented, presentations must be terms of a series; for only by development of the form of a series can they be prevented from falling into the unity of a total impression. In the second place, they must mutually reproduce one another to the full degree of clearness. This condition is satisfied when the terms of the series can reverse their order; when the same series can be brought to flow off in the two opposite directions. Of space as of time we become conscious only through an emotion; but whereas in the case of time the emotion is fixed in its whole intensity in one presentation and therefore becomes desire, in the case of space it broadens out over both of two serially connected presentations and remains mere feeling. Toned sensations predispose to the assumption of the time-form, untuned sensations to the assumption of the space-form.

The elements from which our presentation of tactile space originates are sensations of pressure and muscular sensations. The pressure-sense is capable of developing the space-pre-

sensation independently by means of its own series ; but the concurrence of the two kinds of series makes tactile space what it actually is. The tactile limbs (as well as the eye) owe the greatest part of their space-developments to their mobility, which makes possible varied combinations of their specific sensations with simultaneous muscular sensations. Where pressure-sensations and muscular sensations concur, the latter, as a rule, take the lead.

Discussing the conception of the "local sign," Volkmann contends that this ought to be regarded as consisting simply in the "peculiar colouring, conditioned by the particularity of the place of excitation, of the content of sensation itself." When it is viewed in this way, the difficulties of the conception vanish. Of course the local sign is not to be thought of as a direct feeling of locality existing beside the special *quale* of the sensation.

Various abstract suppositions having been made as to the conditions of vision (a single motionless eye viewing a monochromatic motionless surface, for example, being first supposed), and the factors present in normal vision restored one by one, it is found that space-series can be formed visually only by the combination of colour-sensations with the muscular sensations derived from the movements of the eye. The space-form of the muscular sensations is carried over to the colour-sensations, as in the case of tactile space it is carried over to the pressure-sensations. In visual space, however, it more unconditionally takes the lead. For the qualities of the colour-sense, under the actual conditions of their reception, are not uniformly graduated like those of the pressure-sense ; hence, no space-presentation could be formed by series of colour-sensations alone.

"The space-form is in no way the prerogative of a special class of sensations, but develops itself uniformly wherever the conditions of its development are offered ;" these conditions being the existence of "series" and their reversibility. The musical scale, for example, is presented under the form of space—not, indeed, the space of the external world, but a space of its own. Assumption of the space-form is especially

favoured when muscular sensations co-operate—as, for example, in the case of one who sings the scale up and down. The reason why series of notes so seldom raise themselves to the space-form is that “the space-schema of the muscular, pressure and visual sensations is somatically pre-formed, while the tone-scale has to be constructed by an act of comparison.”

The surface is a “tissue of space-series.” It involves consciousness of a second dimension, because to the consciousness of the two opposite directions of co-existence within the single space-series, that of the co-existence of the series among one another is added. The surface rises to the figure through our becoming conscious of the limit. Presentation of the limit is due to arrest in the passage of the eye from one colour to another. When there is a difference of colours on a surface, the eye learns to move along the boundary so as to avoid the monotony of the “ground” and maintain itself at the maximum of excitation by the contrast. The field of view having been divided up, determination in the direction of limitation suffices to raise the surface into the figure.

When, along with one of the presentations constituting a surface, another is presented in an order of co-existence that coincides with no order in the surface, the starting-point is given for the presentation of space of three dimensions, and for that “closed-off interweaving of surfaces among one another” which constitutes Body. Elements out of which these presentations can arise are the muscular sensations of the hand, and, to a less extent, of the other freely-moving tactile limbs. Let us imagine a person with vision, but without sense of touch, and with a muscular sense confined to the eye. Would such a person form any idea of the third dimension? Of the factors that seem at first to offer themselves for the development of the idea of distance, only two—the movements of accommodation of the single eye, and of convergence in binocular vision—need serious consideration; and these, when examined, are found not to make the presentation of distance possible in the absence of everything but

visual experience. In combined sight and touch, accordingly, the muscular sensations of the hand take the lead in developing the presentation of the third dimension.

"Empty space-series" are formed by mutual suppression of particular qualities and local tones, with preservation only of consciousness of the number and degrees of fusion of the terms of the series. They are first formed on our own body, as is shown by the names of measures, such as foot, span, &c. "Our own body is for the representing of empty space what our own life is for the representing of empty time." Space-presentation having the number and sequence of its terms somatically pre-formed, our empty space-series generally rise to greater precision than our empty time-series. When our empty space-series have received the proper degree of mobility, almost every positing of a final term serves only as a point of attachment for the evolution of a new series; every limit is only a demand to go further. Thus, the empty space-series is freed from every determinate limit. "Infinite space" can, of course, as little be positively represented as infinite time, and its negative significance is less than that of infinite time. In trying to represent to ourselves an infinite space-series, we think of it as one that it would take an infinite time to measure. The order of co-existence that our sensations take upon them independently of us is an order that we seem to find given, and accordingly place where we place the content of our sensations, *viz.*, in the external world; hence the notion of "objective space." From empty objective space the filled spaces occupied by external things seem to us to proceed by limitation and separation. It thus appears as the *prius* of objects. "Out of all relations to this space stand the spaces in which we order our conceptions or figure our imaginations; and since nothing prevents us from constructing these spaces also beyond all determinate limits, it is a paradoxical but true thought that there is more than one infinite space." Strictly speaking, every sense constructs its own space. That the spaces of different senses flow together into the space of the external world has its ground merely in the simultaneity of the constructions. The relative "emptiness" of the muscular

sensation in itself and previous to that collision of qualities by which "empty" series are formed, makes it specially adapted to develop the presentation of the line.

For the discussion of the measurement of space and the estimation of magnitude, it is premised—(1) that the magnitude of our space-series cannot be compared with the magnitude of the "object," the contrast of "real and apparent magnitude" only meaning contrast of the constant magnitude of the space-series of touch with the changing magnitudes of visual space-series; and (2) that our estimate of the magnitude of space-series becomes very uncertain in the absence of comparison with the known magnitudes of sensation-complexes that are present. Several propositions are then arrived at as to the psychological causes of the variation of our judgments on the magnitude of different "space-series" according to the number of their sensational elements, the intensity of particular sensations, &c.

Space of Time (*Zeitraum*), Motion, Number and Intuition are next discussed. The presentation of a "space of time" is found to consist in "the spatial apprehension of a time-series." In the presentation of motion, on the other hand, the spatial is apprehended under the form of time. As duration is known only in contrast to sequence, so rest is known only in contrast to motion. The presentation of number is an abstract product of an operation common to the forms of space and time. The conditions of its origin are—(1) that a series should be given of which the terms are qualitatively like or are taken as qualitatively like, (2) the emergence and holding fast of the presentation of the single term, (3) the measuring-off of the series by means of the term that is held fast, (4) the comprehension of the measurements as a whole. Number is not to be supposed to arise from the repetition of a unity already known as a unity; for unity is itself a number, and comes to consciousness along with the other numbers, or possibly even later. To measure our series, indeed, we need an undecomposed part; but unity of presentation is not, to begin with, the presentation of unity. A clear presentation of unity is arrived at for the most part only by comparison of

such already measured magnitudes as differ by the quantity of a single measurement. Thus if the other numbers are multipliers, unity is as a rule a difference. Those sensation-complexes of which the elements have taken on the form of time or space may be called Intuitions. Number is not an intuition. The result of the analysis of time and space so far may be thus formulated: Out of sensations intuitions are evolved in consequence of the properties immanent in the sensations.

The "localisation" of sensations in the bodily organism, notwithstanding its apparent primitiveness, is a secondary phenomenon. A sensation at first unlocalised receives its space-determination from the reproductive activity that brings it into union with a presentation that has already found its place in the "space-scheme" of pressure-sensations by which we represent the body. Primitively all is vague. By degrees temperature-sensations, organic sensations, &c., become definitely ordered in relation with the interwoven series of sensations composing the surface of the body, and are then said to be "localised."

While localisation goes on in the region of the more strongly toned sensations, "projection," or the assignment of sensations to the external world, goes on simultaneously in the region of toneless sensations. Of projection there are three conditions: (1) a sensation that enters into the intuition of the body, (2) a second sensation, which is not localised, (3) a space-series that inserts itself between the two. Usually these three functions are taken upon them by three classes of sensations: (1) a pressure-sensation marks out the place on the body, (2) a contact-sensation indicates the external thing, and (3) the muscular sense constructs the space-series between the two. Primarily and immediately only sensations of touch are projected. The sense of sight supports itself in its projections on the sense of touch.

Projection does not of itself suffice to complete the presentation of the External Thing as *thing*. For this the conditions primarily required are—projection and consciousness of dependence in having the sensation. Neither of these is sufficient by itself. If a localised sensation is to become a

position on the body, the space-schema in which it is received must be thought of as something that comes to meet the changing sensation and outlasts it; and if the projection of the sensation of hardness is to become the presentation of a projected hard thing, the consciousness of a permanent ground of sensation must add itself at the place of projection to the temporary sensation of contact. On the other hand, the mere feeling of being conditioned by something else is not sufficient of itself to develop the presentation of the external thing. What makes the external thing an external thing is the union of both moments, that is, the constant appearance of the feeling of dependence at a constant place of external space, or "the determination of the *other* by the *outer*." This determination is wanting to the presentation of our own body. Hence if the body becomes a "thing" it does not become an "external thing." For the complete development of the presentation of the external thing two other conditions are to be added: (1) that not single sensations of touch but "total contact-images, *i.e.*, contact intuitions" are projected; (2) that visual and other sensations are projected simultaneously with sensations of touch. The heterogeneous sensations we project appear before us in constant groupings, and changes of time-association with other presentations isolate the groups. For fusion of projected sensations into a total presentation, not only likeness of position in time but also likeness of position in space is necessary. Thus there is no contradiction in one of two simultaneous sensations being projected and the other localised. The sense of touch is the only one that seems to mark out the thing as such immediately on the side of its reality and not of an adhering quality. If we signify by the term Perception the highest form that intuition assumes by its projection, we may briefly formulate the result so far thus: Certain sensations develop into intuitions and certain intuitions into perceptions.

An important part of what is called Illusion consists in wrong localisation or projection. Of illusions in general there are two classes—*viz.*, "illusions of internal perception" and "illusions of sense." In illusions of the first class we assign

to a presentation (which, as a particular phenomenon, is no illusion) a predicate from among psychical modes of occurrence which does not belong to it. An illusion of the second class consists in this, that in the particular case localisations and projections are made which either cannot maintain themselves at all, or cannot maintain themselves in the manner in which they are made, against the harmonising mass of other localisations and projections. "The possibility of illusions of the second kind rests on an illusion of the first kind; for the fault in localisation and projection presupposes localisation and projection in general; but that a presentation should appear to us not as a presentation, but as something else, is an illusion of internal perception. Let this substitution be once ratified, however, then only the particular case can be regarded as an illusion of sense where either an unpermitted or a false use is made of the conceded right of externalising a presentation." Illusions of sense are divided into "hallucinations" and "illusions" proper. In hallucinations, mere reproductions are taken for sensations, and as such localised or projected, when they ought not to be localised or projected at all. In illusions properly so called, either localisation and projection are interchanged, or within the sphere of one of them a wrong position is assigned to the particular presentation. There are cases on the borderland of illusion and hallucination where a sensation is the starting-point, but a reproduction called up by this sensation is projected. Of these cases there are two classes: (1) where the reproduction merely alters the content of the sensation, which is itself rightly projected; (2) where the sensation merely serves to confer its own "liveliness" on the reproduction, which is falsely projected. Illusions of the first of these kinds are scarcely "illusions of sense" at all, but ought rather to be classed as errors of internal perception. Those of the second kind are essentially hallucinations. That transformation of reproduction into sensation in which the essence of hallucination consists, may be brought about in two ways: either (1) the reproduction annexes to itself the degree of liveliness of a sensation already present, or (2) it sets going by its intensity

a somatic excitation, which then acts as a centripetal stimulus, and associates sensation with reproduction. Hallucinations of the second class constitute so-called "visions."

The presentation of the Ego, to which Volkmann now proceeds, he views as developing itself in three stages. In its first stage of development it is the presentation of "the sentient and desiring body," to which are opposed as Non-ego external things. The Ego of the second stage is "the consciousness of the representing and desiring interior." The bearer of consciousness is for us at this stage internal because organic sensations are associated with the feelings by which it responds to presentations. The specific Non-ego of this stage is the presentation "as image of the external thing." To the feeling and desiring interior is opposed "the, in itself, indifferent presentation." The "interior" is related to the images of things as the body to things; from them come its feelings, to them its desires are directed. The body as opposed to the interior is now external—an antagonism that reaches its full degree of sharpness in the next period. The third stage of development is that of "the Ego as thinking and willing subject," to which is opposed as object "the thought." Representation has now developed into conception and desire into will. There is interaction of thought with "the fixed kernel of our interior." Of this interaction (as of the interaction of the former stage) we become conscious through emotions, which, though less toned, are still not without some resonance of organic feelings. Thought appears as a product of the spontaneity of the subject, and the body, at this stage, is altogether expelled from the presentation of the Ego. At all three stages the development of ideas of the "foreign Ego" runs parallel in consciousness with that of our own Ego.

The Ego is nothing but a "psychical phenomenon." Its "presentation" is not the representation of a being or of a combination of beings. It is the soul that is a being; and the soul is pre-supposed metaphysically, not arrived at by psychological analysis. Nor has the "Ego-presenta-

tion" any determinate content. It is merely the becoming conscious of an interaction within an immeasurable presentation-complex; and the presentation that has and knows all others is itself quite indeterminate, being known only as "a point indicated by a manifold presentative activity." From this indeterminate Ego is to be distinguished "the empirical Ego" of each person, which is not absolutely indeterminate, but gives a special "total impression" depending on temperament, history, &c. In different persons, for example, the empirical Ego has predominatingly the character of one or other of the three stages of development of the Ego-presentation. For these are not periods of a single history in the sense that one period ends where another begins, but to a certain extent independent histories which, after successively starting, proceed for a time parallel with one another. Accordingly, all sorts of combinations of different degrees of advance of the different histories may be imagined in different persons, and even in different "presentation-circles" of the same person. To the empirical Ego "the time-series of life," or its total impression as called up in the present, may almost be taken as equivalent.

"Internal perception" involves three things: (1) the becoming conscious of a presentation; (2) the becoming conscious of its presentative activity; (3) the becoming conscious of the belonging of this presentative activity to the Ego. The real occurrence behind the appearance of the Ego's knowledge of the presentation is the soul's becoming conscious of an interaction between one of its presentations and the most ramified of its presentation-masses. "As the Ego first arrived at development by differentiation from the Non-ego, internal perception now re-integrates this diremption by setting the Non-ego in continuity with the Ego." It is through internal perception that the Ego at last becomes the central point of the whole life of presentation. The Ego, accordingly, may now be defined as "the subject of internal perception."

While internal perception takes place in "the subjective sphere of presentation" and ends with the judgment, "I have

A," the process of "Apperception," which has now to be considered, takes place in "the objective sphere of presentation" and ends with the judgment, "A is Z." Apperception is nothing but the fusion of a new, isolated presentation-mass with an old one superior to it in extent and internal equilibrium; if the two are not conformable to begin with, then after transformation of one by the other. Internal perception and apperception are thus only two sides of the same process, *viz.*, "reaction of the old upon the new." One of the two may, nevertheless, in special circumstances, entirely give place to the other. In deep thought that follows only the content of presentations, internal perception disappears; in strong feeling, while knowledge of the feeling—that is to say, its internal perception—remains, "apperception" of it by the maxims that are applicable disappears. When the new is quite conformable to the old, it is apperceived without internal perception; when it is unconformable, it is internally perceived without apperception. In psychological observation, apperception is internally perceived and internal perception apperceived.

To be "attentive" to something is to hold back a presentation, or a series or mass of presentations, from "sinking." Attention is "sensible" when its condition is the duration of a somatic stimulus, "intellectual" when its condition is an activity of psychical "aids." Voluntary attention is not to be added as a third kind. "Attention" is a state, which may or may not be brought on voluntarily by the voluntary bringing on of its conditions, but, once brought on, is either sensible or intellectual. Of intellectual attention the most eminent case is when the giving of an "aid" is due to an apperceiving presentation-mass. All that excites and develops in us apperceiving masses finds attention. The relation of a presentation to the ruling presentation-masses of the Ego being described as the "interest" which the subject brings to the presentation, it may be said tautologically that "we bring attention to all that interests us."

"Self-consciousness" may be defined as "internal perception within the Ego." From the wide circuit of pre-

sentations that is the basis of our consciousness of the Ego, two different parts or modifications take up a position outside and opposite one another, like subject and object in internal perception; both presentation-masses then return into the totality of the Ego-presentation, and are known as parts of the same continuum. The Ego "first differentiates itself," as it is itself differentiated from the Non-ego, "then re-integrates itself out of this differentiation." What divides itself phenomenally is not, of course, "the pure Ego"; nor is the identity that takes away the division anything but continuity of two presentation-masses in the same totality. "The pure Ego is only the abstract formula for that process by which the Ego-phenomenon completes itself."

Abnormalities in the functions of the Ego are of three kinds: (1) Disturbances in the interaction of the Ego with other presentations, or Suspension of internal perception; (2) Disturbances within the presentation-circles of the Ego, or Abolition of self-consciousness; (3) Development of an abnormal Ego, and persistent suppression of the normal Ego by the abnormal. Insanity is not reached till the abnormality assumes to itself the form of the Ego, and continuity with past life appears broken. However much it may be preceded and accompanied by illusions and hallucinations, these do not constitute it. It is, literally, "alienation," or becoming another person.

The psychological theory of the Ego having been set forth, we are in a position to deal with mind as thinking, feeling, desiring, and willing. "Thought" Volkmann defines as "that uniting and dividing of presentations which has its ground solely in the content of the presentations themselves." Thinking presupposes the formation of the concept from the presentation. The origin of the concept, accordingly, is the first point to determine.

The Concept is the presentation or presentation-form set free from everything extraneous that adheres to it. To the presentation adhere its fusions with other presentations; to the presentation-form its becoming conscious in and along

with the particular qualities of the terms between which it is a relation. So far as the presentation is concerned, we know that no fusion, once completed, can be annihilated, but that each particular fusion can be paralysed in its activity by the activity of all the rest. So far as the presentation-form is concerned, the theory of time and space taught us that consciousness of the same form may be involved in the consciousness of quite different presentations, and by the comprehension of these in the same total impression may be to a certain extent isolated. The process of setting free the consciousness of a presentation or a form, *i.e.*, relation (*Verhältniss*), from all extraneous relations (*Beziehungen*) by the reciprocal arrest of extraneous relations is called Abstraction. All concepts arise by abstraction.

Concepts are divided into conceptions of objects, of attributes, and of relations. Conceptions of objects are divided into individual and generic concepts; conceptions of relations, into form-concepts of intuition and of judgment. The preliminary stage of the individual concept is the presentation of the individual object; of the generic concept, the "generic image" (*Gemeinbild*). The object-conception isolates total presentations; the attribute-conception, partial presentations. For the obtaining of form-conceptions, presentations must be fused in series, and must be at the same time distinguishable. The condition of our obtaining them is an emotion, by which we become conscious of the relation of the presentations. The forms of intuition are Time and Space; the forms of judgment, Identity and Dependence with their opposites. Generic images of the former are "empty series"; of the latter there are none but artificially constructed generic images. To the original conceptions arising by abstraction we must attach the "derivative concepts," which are artificially constructed from conceptions of objects and attributes by means of the form-conceptions.

To carry the conception beyond the generic image to the stage of the logical concept—which abstraction by itself is powerless to do—there are three auxiliary means, *viz.*, internal perception, apperception, and "designation of the concept by

the word." Internal perception sets the generic image free from reference to the external thing that was perceived, and apperception sets it free from the space-form. Internal perception cannot transform the fluctuating complex of presentations in which arrest and fusion work against each other, that stands for the concept, into a "rounded-off, resting presentation." What it does is to place the whole complex before the Ego, and thus to give a certain "inwardness" to the presentation-mass, to confer upon it a certain tone. The influence of apperception goes further. When once a number of concepts in a measure fixed have been developed, the more general concepts act apperceptively on the special concepts and analyse their manifoldness into its qualitative moments. A concept that comes under the point of view of a more general concept gets one of its determinations fixed, and whatever fails to get fixed by a point of view sinks back. Apperceptions of this kind give the first point of application for definition, which is, "the place-determination of a given concept in a given system of concepts." Of yet greater importance is the designation of the concept by the word. "Internal perception holds the concept fast and transfers it to the internal world; apperception analyses it and in a measure transforms the spatial manifoldness of its parts into the logical manifoldness of its marks; but the designation by a sound fixes the concept by means of a reflex from the external world and under the unity of this reflex comprehends the internal manifoldness as a unity."

The concept in the logical sense is an ideal to which the conceptions we actually form may approximate but which they can never reach. For the logical concept is a "completed, resting, determinately limited presentation," whereas psychological concepts are "imperfect fusions of the homogeneous, imperfectly isolated from fusions with the heterogeneous." Concepts are specially adapted to become apperceiving presentation-masses. In fact, almost all our apperception of perceptions depends on the concepts we have acquired.

In judging we become conscious of the positing or annulling of one presentation by another. The Judgment accordingly

pre-supposes (1) a relatively fixed presentation lying at the root of the process, (2) a presentation raised into consciousness by the former and subsequently fusing with it, (3) a checking of the fusion of the two, such as is necessary in order to raise the fusion as such into the object of consciousness. These pre-suppositions give respectively the subject, the predicate, and the copula. According as the ground of the positing of the predicate is in the content of the subject or outside of it, the judgment is, for the logician, analytical or synthetical. For the psychologist, the difference between the two kinds of judgment points to the contrast between immediate and mediate reproduction. "Every analytical judgment is the becoming conscious of an apperception, as conversely every apperception of which we become conscious assumes the form of an analytical judgment." The synthetical judgment rests on "accidental fusions." Apperception is here absent. The synthetical judgment rises into the "judgment of dependence" only when to the consciousness of fusion consciousness of its necessity is added.

Suspension of judgment is accompanied by a "tension"; conviction, or the resolution of this tension, by a pleasure. As the concept is fixed in the word, so the judgment is preserved in the sentence. The psychological judgment falls as far short of the logical judgment as the psychological falls short of the logical concept. "Psychologically a prejudice is as much a judgment as knowledge, and knowledge is nothing but the becoming conscious of the necessity of the fusion of two presentations."

The consciousness of necessity in judging arises when we find ourselves dependent in our determinate judgments on something other than the accidental relations of presentations. That on which we find ourselves dependent can only be either (1) the content of the presentations independently of the fact of psychical occurrence, or (2) the mode of happening of the presentations so far as it is withdrawn from our influence. The first condition gives psychological necessity to the analytic, the second to the synthetic judgment. From consciousness of the necessity of the former proceeds the con-

ception of "identity"; from consciousness of the necessity of the latter, the conception of "dependence." Of identity we become conscious in the analytical judgment in so far as we become conscious of the apperception that constructs the judgment. The case of the synthetical judgment is more complicated. Reproductions, for example, appear as dependent on the subject; but this dependence does not give the consciousness of necessity. The dependence from which we get the consciousness of the necessity of the synthetical judgment is the dependence of sensations on something external. Complexes of sensations, *i.e.*, intuitions or perceptions, have only two modes of being given in which they appear thus dependent: (1) the synthesis of partial presentations in the total presentation of the external thing, (2) the succession of sensations in the time-series of changes in the external world. From the first kind of dependence we get the conception of Substance, from the second the conception of Cause. The conceptions of substance and cause belong to the class of artificial concepts described as educed from given concepts by the application of a form-conception.

The necessity so far considered is merely "subjective." But the characteristic of knowledge in the logical sense is "objective," as distinguished from merely subjective necessity. Without some consideration of "knowledge" in this sense we do not arrive at an explanation of "thought." For "knowledge," defined as that kind of judgment in which subject and predicate are connected with objective necessity, or in which their connexion is determined solely by qualitative relations, is identical with the "thinking judgment" (*denkendes Urtheil*). Knowledge being thus defined, there is evidently no difficulty about the raising of the analytical judgment into knowledge. The analytical judgment gives knowledge when both the presentation-masses that enter into its apperception have developed into pure concepts and interact only as such. Between concepts as such no other relations are possible than those of thought. The completed apperception of one by the other involves the knowledge of their qualitative identity. "Synthetic knowledge," on the other

hand, seems at first to involve the contradiction that two presentations with divergent qualities are necessarily connected, "that is to say, that two presentations which are not one are yet to be counted as one." The solution of the difficulty is that in synthetic knowledge either one presentation is only a changed apprehension of the other, or both are only different apprehensions of the same third thing. "In the transformation of the *aliud* into the *idem per aliud* lies the logical justification of synthetic knowledge." Synthetic knowledge is possible only in philosophy (which has to do with "metaphysical" and "æsthetical" synthetic judgments) and in mathematics.

The Syllogism (in a generalised sense) is, psychologically, a mediately affirmed judgment that has bound up with it the consciousness of mediation. The need of syllogising arises from the collision of concepts. No less than the psychological concept and judgment, the psychological syllogism falls short of the logical. The rules of the syllogism, and of logic generally, Volkmann here points out, constitute an art for the regulation of thought, not an account of natural psychological processes as they go on when left to themselves.

The "degree of perfection of thought" consists in the degree of its approach to the ideal fixed by logic. The perfection of the judgment consists in its correctness (*Richtigkeit*), the determination of which properly falls outside psychology. If, nevertheless, we take up the question of the correctness, rightness or validity of the judgment, we may draw the distinction between "subjective" and "objective" correctness. A judgment is "subjectively correct," when it is in accordance with the whole of our permanent presentation-relations, and not merely with a temporary state of preponderance of particular presentations and their casual relations. It is "objectively correct" when the right presentations are placed in the right relation. That relation is right which makes the judgment into knowledge. The presentation, if a sensation, is right when it is rightly projected or localised; if a reproduction, when it is ordered in accordance with sensation; if a concept, when it is assigned to its right place in a fixed "con-

cept-tissue." This concept-tissue, the place in which determines the objective correctness of the concept, is, in daily life, that which has been fixed by language; in speculation, "the logical schema of science." Different from the rightness or correctness is the "holding for true" (*Fürwahrhalten*) of a judgment. We hold that judgment for true of which the predicate maintains itself unmoved beside its subject, in spite of all attempts at arrest by other presentations that likewise offer themselves as predicates. If no predicate obtains this absolute preference, but one of them retains permanently the relatively highest degree of clearness, we call the judgment that unites this predicate with the subject "probable." A judgment that is held for true though passed before the possession of the right concept or outside the right relation of concepts, is called—in a wide sense of the term—a "prejudice." Prejudices are not necessarily either objectively incorrect or subjectively correct.

Feeling (or Emotion in the general sense) arises when we become conscious of the presentative activity as distinguished from the content of a presentation. We become conscious of the presentative activity through its pressing upon a resistance, which pushes it back upon itself and thereby makes it its own presented content. Feeling is primarily the becoming conscious of the degree of tension of the activity thus resisted. In its contrast to presentation, and as excluding consciousness of a determinate *quale*, feeling it is said to be "subjective"; in its contrast to desire, and as excluding consciousness of a determinate direction towards an external effect, it is said to be "passive."

Since the tension through which feeling arises is the state of a presentative activity either pressed down by its arrest or freeing itself from it, feeling is in respect of its tone either "non-pleasure" or pleasure. Pleasurable presupposes non-pleasurable feeling, and is therefore a secondary phenomenon; but it is at the same time something positive, not a mere negation. The presupposed non-pleasure need not immediately precede the pleasure in time, nor need it have won for

itself a distinct consciousness. There are "mixed feelings" in the sense that the different partial presentations of the same total presentation may be accompanied by feelings of opposite emotional tone, but not in the sense that there may be opposite emotional tones in the same presentation. While the particular feeling taken singly is always pure, the total feeling is nearly always mixed.

Besides its "tone," there are to be distinguished in feeling the properties of "intensity," "rhythm" and "content." The strength or intensity of a feeling is the degree of intensity of its tension. The rhythm of feeling arises from the circumstance that neither does the intensity of feelings diminish uniformly nor their tone maintain itself the same. Feelings may be divided, as regards their rhythm, into—(1) those that end with the tone with which they began, (2) those that pass into the opposite tone, (3) those that vibrate during their whole course between the two opposite tones. Total impressions of simultaneous feelings may be divided into—(1) mixed feelings that end as pure feelings, (2) pure feelings that become troubled in their course, (3) mixed feelings that periodically become pure or approximate to purity. Feeling receives its "content" from the presentation whose presentative activity is its "bearer."

The explanation previously given of "the tone of sensation" has its ground in the explanation of emotional tone. For sensation springs from the flowing together of elementary states, while feeling is borne by formed presentations. Now the formed presentations that are the bearers of feeling are present to consciousness. The bearers of the tone of sensation, on the other hand, are for ever withdrawn from separate consciousness. Thus the composition of feeling is more accessible than the composition of the tone of sensation, while it offers an analogy with it.

Of great importance for psychological theory is the "somatic resonance" of feelings. This "reflex sensation," which has its physical basis in the vegetative system while its effects extend beyond, is in inverse proportion to the instinctive movement that accompanies the feeling.

Particular feelings come to be localised in particular groups of presentations. Sometimes they get wrongly localised. By attention to their determinate character they may be detached from particular groups of presentations and even from presentations in general. Determinate feelings may be "projected" into external things.

There is no interaction of feelings as such. The "interaction of feelings" is a mere appearance, at the root of which lies interaction of the presentations that are the bearers of the feelings. Thus simultaneous feelings arrest one another only when the presentation-circles in which they have their seat arrest one another, and fuse only when the presentation-masses fuse in which they dwell. The reproduction of a feeling is, strictly speaking, always a new production.

Different persons manifest persistently predominant emotional tones of different kinds, depending on a permanent attitude of the Ego to new presentations. According as the Ego habitually feels itself furthered or hindered by these, the person is said to be "light-minded" or "heavy-minded." When the Ego habitually rejects new impressions there is "equanimity." Those natures in which a certain mean state of light or heavy feeling is kept persistently and as with an effort, so that all momentary tones and particular feelings end, as it were, in this permanent "ground-tone," Volkmann calls "affective" (*gemüthlich*). Those, on the other hand, in which the ground-tone of feeling easily gives place to momentary tones and particular feelings he calls "genial."

Some feelings are limited both in their origin and development to one and the same definite circle of presentations, while others, either in their origin or during their course, spread indefinitely from one presentation-circle to another. Feelings, accordingly, may be classified into "fixed" and "vague" feelings. In the case of fixed feelings, the presentations can be definitely assigned from whose interaction the feeling proceeds; in the case of vague feelings they cannot. Among fixed feelings those take the first place in which the complete ground of the feeling is given in the qualitative relations of the presentations of a homogeneous presentation-

circle. Fixed feelings of this kind raise the claim to universal validity and necessity in the sense that in them there is not merely a necessary connexion between the occasioning presentations and the feeling, but that from among the occasioning presentations themselves all casual relations are excluded. From this class of fixed feelings is to be distinguished a second class in which the ground of the feeling is partly, and a third in which it is wholly, in fusions of presentations as distinguished from their purely qualitative relations. Fixed feelings of the last class approximate to vague feelings; for when mediate reproduction is once excited, the excitation propagates itself in ever-widening circles and at last indefinitely. To the first class of fixed feelings belong the æsthetic and ethical feelings; in artistic and religious feelings the influence of fusions is already to a certain extent active; in most of the "nature-feelings" the transition to vague feeling begins to appear. The vague feelings may be classified according to their degree of differentiation from the "common feeling."

By æsthetic feeling is to be understood "that fixed feeling in which the qualitative relation of a determinate combination of presentations reflects itself in its purity." Æsthetic feeling has for its positive condition clear presentations; for its negative condition the power to close off the circle of these from the presentation-circles of daily life. It is thus "unconditional," while the pleasure in the recognition of a teleological relation, for example, is "conditional." An æsthetic emotion more easily arises in contemplation of the unfamiliar, because this is more easily viewed by itself apart from its relations to anything else. With play æsthetic feeling has this in common, that it begins where the needs of life end.

Art is not always and from the beginning Fine Art; in other words, its aim is not originally to call up æsthetic feeling. The work of art is primarily an individual thing that claims to signify a universal. To the end of giving this significance to its work, art employs three means: first, it isolates its object from the real world; secondly, it abstracts from everything empirically determinate that signifies nothing in relation to the universal it aims at portraying; thirdly, it confers deter-

mination by raising beyond what is empirically given those features that have significance for its aim. As art advances, it becomes more and more æsthetic. In so far as it aims at its end by means of æsthetic form, it becomes fine art.

Ethical feeling, viewed as "satisfaction or dissatisfaction in the relations of the images of the will," is a kind of æsthetic feeling, distinguished from others by the peculiarity of its objective basis. The difference of the ethical feeling from the other æsthetic feelings lies in the immediate relation of the presentations in which it is based to the actual will of the subject. For the will of the subject is in accordance with the ethical judgments that have arrived at recognition, or it is not; and this relation is itself an ethical one and pleases or displeases. According to the nature of the relation is the nature of the pleasure or displeasure. Historically the ethical feeling originates in social relations.

Religious feeling is related to ethical feeling as art-feeling to æsthetic feeling. It originates not in ethical feeling but in a feeling that may be called one of "dependence" on an external power. Afterwards it becomes moralised. In its highest perfection it consists in "the feeling of absolute dependence on a physical and ethical absolute."

Definitions of the various forms of "self-feeling" and sympathy (together with its opposite) are followed by an analysis of the "nature-feeling" briefly referred to above. The kind of nature-feeling Volkmann chiefly has in view is the emotion excited by landscape, which he finds to consist in a harmonious combination of fixed (æsthetic) and vague (organic) feelings.

From Feeling, or Emotion in the general sense (*das Gefühl*), Volkmann distinguishes Emotion in a more special sense (*der Affect*) as being, instead of a resting state of the feelings (*Gemüthsruhe*), a movement of feeling (*Gemüthsbewegung*). Emotions, in this sense, owe their origin to a certain "surprise" of old presentations by new ones; their continuance to the fixing influence of a somatic reaction. They may be divided into "depressing" and "exciting" emotions. In the former (illustrated by Fear) the newly entering presentation

presses the whole consciousness below the normal state of equilibrium; in the latter (illustrated by Anger) the new presentation divides the old presentations into two groups, one of which it raises and attracts while it drives the other back. Depressing emotions are always painful; exciting emotions, at a certain stage pleasurable. Depressing emotions destroy apperception and lower self-feeling; exciting emotions intensify apperception and raise self-feeling. An emotion has three periods: (1) entrance of the new presentation and disturbance of equilibrium, (2) culmination of the movement, (3) gradual restoration of equilibrium. It is in the second period that the somatic reaction plays its chief part.

When the degree of clearness of a presentation remains constant while the degree of tension of its presentative activity increases, there is Desire. Desire is thus a form of consciousness involving at once presentation and feeling. It is the consciousness of a "conation" or "striving" directed to the bringing on or against the persistence of a heightened degree of liveliness, clearness or completeness of presentation. From the mere effort of an arrested presentation to rise, it is distinguished as being accompanied by consciousness. To feeling it is related, as an activity directed towards something beyond is to an activity turned back upon itself.

If we understand by "desire in the narrower sense" the becoming conscious of the effort of the presentative activity to raise its presentation, and by "aversion" the effort against the resisting contrary, then every desire in the wider sense is at once desire and aversion. Desire is simplest when the three moments of which it is composed are assigned to three different presentations. This is the case when the presentation that forms the object of the desire is raised by another fused with it, and hindered in its ascent by an opposite presentation. The first of these moments is the desired presentation; the second is the impulse (*Trieb*) occasioning the desire; while the third is the opposition, the function of which only in the rarest cases falls to a single presentation. "Satisfaction" is that

pleasure which ends the desire by transformation of the conation into actual presentative activity. The "impulse" is not to be placed in the expected pleasure of satisfaction. Strictly speaking, the desire does not seek satisfaction as such, but finds it when the tension is resolved.

In desire, as in feeling, may be distinguished "content," "intensity" and "rhythm." The content of the desire is the desired presentation. There are no absolutely vague desires in the sense in which there are "vague feelings." That most easily comes to be desired which attracts attention. The intensity of desire depends on the intensity of the impulse and on the degree of fixation of the opposition. Under the head of "fixation of the opposition" comes the effect of prohibitions, dangers, &c., in intensifying desire. There is rhythm in desire—(1) in so far as between the limits of desire and satisfaction the tones and degrees of feeling change, and (2) in so far as there is alternation between rest and movement in the whole psychical life.

A desire is reproduced when the presentations are reproduced from whose interaction it proceeded. As little can there be direct reproduction of desire as of feeling; but desire is more accessible to reproduction through its objective nucleus than mere feeling. Dispositions to desires, so far as they are grounded in established relations of presentations—which are acquired especially by habit—are called Inclinations. When they have reached a specially high degree they are called Propensions.

"Feeling is passive, directionless, blind; desire is active and directed to an end that it knows, or at least thinks it knows." Feeling becomes desire as soon as "fixations" mix themselves with the presentation-circle in which it is based. Thus, for example, "pity becomes benevolence; liking, love; hope, longing."

The ordinary classification of desires into "lower, sensual" and "higher, intellectual" is based on the contrast between sensation and reproduction, applied now to the desired presentation, now to the impulse. Among "desires of sense" two classes may be definitely distinguished, *viz.*, "the pathological

desires of sensation, and the—in the wider sense—æsthetic desires of perception; of which the former are composed in all their moments of strongly toned and therefore localised sensations, as hunger and thirst, while the latter have their seat in less toned, clear sensations, and therefore have play in the region of projection, as desires upon perception of moving objects or of regular shapes."

The form most frequently taken by Impulse is that of a "series." The complication of the form of impulse proceeds to the interweaving of series, and reaches its highest stage when the desired presentation forms the central point of a tissue. "On centralised interweavings of series rests everything that we are accustomed to call Love."

Desires are less mutually compatible than presentations; for even heterogeneous desires arrest one another, and every arrest of desires proceeds to obscuration. Simultaneous desires can only continue to co-exist when they coincide in the same desired object. Coincidence can take place in three ways: for either the desires may be directed to different partial presentations of the same total presentation or they may act together in the same particular presentation, and in the latter case they may act either in the same or in opposite directions. "In the conflict which the third case involves, the two desires take up alternately the parts of 'desire' and 'aversion,' and since every progress in the one direction has for its consequence a heightening of the conation in the opposite direction, the interesting paradox results that simultaneous opposite desires intensify one another."

In immediate connexion with the theory of the impulse, Volkmann continues his account of Instinct—now defined as "that organic pre-formation in consequence of which a determinate impulse transforms itself in a constant manner into a determinate bodily movement without the intermediation of a clearly-appearing presentation." The impulse is not in itself a desire, since the direction to a determinate presentation is absent; but it becomes a desire when a more or less clear presentation, by the reproductions it occasions, attracts it to itself. The instinctive impulse is always "obscure,"

because it is always composed of organic sensations, but the desire in which it expresses itself is not obscure. In instinct the whole appearance of pursuit of ends is to be set "to the account of the somatic pre-formation."

Volition is desire that has arrived at the prevision of its satisfaction. This prevision, or judgment as to the attainableness of the desire in a determinate way, is the result of the carrying over of the desire from the end to the means and consequent checking of the original desire. Like desire, volition contains in itself no "causality of its satisfaction," for many volitions remain unsatisfied; but it knows of such a causality, and on the ground of this knowledge expects its satisfaction.

All Volition includes Thought as part of itself. For thought is necessary in order to "transform the *post hoc* of the time-series into the *propter hoc* of the causal series," and thereby give the security of attaining what is desired. In relation to the thought involved, three periods may be distinguished in the history of every volition, *viz.*, "reflection," "deliberation," and "resolution." As compared with desire, volition has a specially intimate relation to the Ego, from which it has the appearance of proceeding.

The volition resolved on may remain suspended. The suspended will is called "purpose"; the realised will, "action." Action, again, may be either "external" or "internal."

The completed volition, whether it has remained a purpose or has proceeded to action, becomes the object of a judgment, which has the "pathological eudæmonistic" or "æsthetic ethical" character, according as it connects with the volition a feeling of pleasure or displeasure, taking its origin from a material relation of the willed object to the total will of the subject or from a purely formal relation of the particular volition to another volition. Both kinds of judgment are extended from judgments on particular volitions to judgments on whole classes of volitions, and, in becoming themselves objects of a deeply ramified will, rise to the rank of "practical

principles" or "maxims"—of "happiness," or of "morality," as the case may be. Ethical judgments upon volition usually appear later than eudæmonistic judgments, because they presuppose a more abstract apprehension of the volition; but they are more rapidly transformed into imperatives.

From the apparent arbitrariness of the resultant volition in cases of conflict among volitions and maxims, arises the problem of Free-will. Volkmann's solution of the problem is that only in appearance does the resultant volition take its origin from "an Ego hovering over the conflicting volitions." Ego and "end-volition" are alike phenomena resulting from the interaction of presentations; and they result from the interaction of the same presentations. There is thus no free-will in the sense of an emancipation of the will from law. Freedom, in the sense in which it can be admitted, consists in determination of the will by a law recognised by the person willing. It is "autonomy"—not "arbitrary choice"—as opposed at once to "heteronomy" and to "anarchy." It is not freedom of the "will," but of the person. The law with which, for the person to be free, the will has to be brought into conformity, is the "practical maxim." Consciousness of freedom is consciousness of the determination of the willing Ego by the knowing Ego.

"Moral" as distinguished from merely "psychological" freedom consists in determination of the will exclusively by ethical as distinguished from eudæmonistic maxims. The sum of a person's ethical maxims is his "practical insight," and this, so far as it appears under the imperative form, may be called Reason. To be morally free, accordingly, is to have the will determined by reason. What reason is to the completed volition, Conscience is to the purpose.

Psychological freedom as a permanent property of the subject in relation to a whole class of volitions is called a "trait of character"; extended over the whole of volition, Character. "That character is moral of which the supreme principle is conscience, or, in other words, the moral character is the realisation of reason in an enduring whole of volition." The opposite of freedom as a permanent property of the

subject is Passion. "The essence of passion consists in this, that with respect to a class of volitions the maxim is indeed heard, but the will is decided against the maxim." Passion (*Leidenschaft*) is distinguished from Emotion (*Affect*) as a permanent disposition from a transitory state. Repetition of the same "emotion" may give origin to a "passion" as the feeling becomes sharpened into desire.

With these discussions of Freedom, Reason, Character, and Passion, Volkmann prepares the psychological ground for the theory of legal and moral responsibility which he develops in some concluding pages. This takes us beyond the region of pure psychology, and the exposition may here close. The only remark that need be added is an expression of the writer's sense of the inadequacy of this attempt to give an idea of the value of Volkmann's treatise. When reduced to a bare outline, the book inevitably loses what constitutes its most distinctive feature for the student, namely, the exhaustiveness of its detailed treatment. Some idea may, however, have been given of its systematic completeness of arrangement and of its breadth of general view.

POLITICS AND INDUSTRY.

IN Europe there is at present no "military problem." There are, undoubtedly, discussions on the chances of war and on the degree of efficiency to which particular armies have attained, but there is no military problem in the sense in which there is an "industrial problem." In other words, there is no difference of opinion as to the relation of the army to the State. It is admitted on all sides that military efficiency is not to be left to chance, but is a thing that governments must attend to ; and it is admitted that the State does not exist in order to keep up an army, but the army in order to preserve the State. Nor is it any longer necessary to devise means by which military efficiency may be rendered compatible with any type of political institutions. These are determined by the general political movement ; while the type of military organisation is determined independently by military exigencies.

This was not always so. There have been times when it was necessary to prove by elaborate argument that if it has too little strength for war a nation cannot be sure of maintaining its existence. On the other side, too great military efficiency has presented itself as a danger to free institutions, and schemes have been worked out by political thinkers for combining freedom with the national strength which they saw to be necessary. Thus the question was not simply how to bring to bear the knowledge of experts on a public opinion that was in agreement about the end, but ignorant of the means. Theories as to the form military organisation should take were involved with disputed questions about the political structure of society. General ideas, arrived at by reasoning on facts

accessible to every one, had still a share in modifying the course of events. Partly by the influence of such general ideas, and partly by the conflict of forces, a solution capable of lasting for a time has been at length attained. Anything in advance of the present solution—any kind of international organisation, for example—now seems more out of the range of speculation than it did in the eighteenth century.

The cessation of the military problem as a question of general politics has been accompanied by the rise of the industrial problem. There have been times, of course, when there was no "industrial problem." A certain industrial system was accepted by every one, and all change that was introduced in it came about through unconscious processes; or, more exactly, through processes not determined by any conscious effort on the part of society to shape the industrial system as it ought to be. So far as there was any conscious collective effort, it was simply an effort to promote prosperity within the lines of the existing system. It need hardly be said that the present is not a time when this is all that is aimed at. The whole attitude of society or of the State towards industry has become a question for conscious deliberation. The question is not simply to find the means of attaining an end that is agreed upon. There is no agreement even as to the general form of the solution. This being so, the question is not one simply for experts. At its present stage, light may be thrown upon it by reasoning that proceeds on entirely general grounds; that is, without any reference to specific proposals.

The best means of throwing light upon the question in its general aspect seems to be a classification of the chief possible solutions. There is at least a chance that the right solution may be arrived at by elimination of the wrong ones.

First, the solution known as *laissez faire* may be considered. The advocates of this solution may be most correctly described as industrial anarchists. In spite of disclaimers, this is the doctrine that furnishes the intellectual basis for nearly all attacks on "socialistic legislation." It is, perhaps, the first conscious attempt that has been made to solve the industrial problem. It owes its plausibility partly to the fact that it

really embodies some truth, and partly to a confusion. The confusion consists in an identification of economical *laissez faire* with political freedom. The truth it contains is the clear conception of some results of the science known as political economy. When economists had shown that in particular kinds of commercial transaction, such as international trade, the country that does not interfere with the economical course of things will be the most prosperous commercially, it was an obvious practical inference that, whenever commercial prosperity is the thing desired, the State ought to let transactions of this particular kind alone. The *laissez faire* school drew the correct inference; but it proceeded to generalise it into a precept applicable at all times and places and to every kind of commercial and industrial transaction. No doubt exceptions were admitted, but they were admitted only as exceptions to a general rule. The line usually taken now is to go on admitting more and more exceptions, while yet continuing to maintain that the rule is true in its generality. Still this process, continued long enough, amounts to the rejection of *laissez faire* as a universal precept. By gradual concessions on the part of its practical defenders, it is being reduced to the position it was entitled to claim at first—that of a rule true in some particular cases. In practice its application has been mitigated, both by survivals from an older state of things and by new modern legislation proceeding from motives not purely economical.

The type of society that consistent industrial anarchy tends to produce is the plutocratic; and its advocates are now mostly found among the friends of plutocracy. When no function of the State in relation to industry is recognised except that of clearing the ground for unlimited competition, the natural consequence is that everything is made subordinate to this kind of industrial struggle, and that those who are most proficient in it attain, together with wealth, the largest share of political power. With conscious or unconscious art, the industrial anarchists proclaim their cause to be that of individual freedom. Yet it is a fact that freedom, in its political sense, was understood and fought for long before the maxim of letting industry alone—

whether right or wrong commercially—was heard of. And, when we look at the actual state of the case, the contradiction between individual freedom and regulation of industry by law is seen to be quite illusory. The operations of the greater industry—and this is what it is commonly proposed to regulate—are part of an immense and complicated mechanism where there is no room for really free contract in matters of detail between individual employers and workmen. The action of the mechanism, left to itself, is determined by the comparatively blind forces recognised in economics—love of gain and need of subsistence. State-intervention brings to bear upon it forces involving both more intelligence and more regard to ethical ends. By this means it sets the individual free, in a larger number of cases, to become more of an end for himself and less of an instrument for external ends. It thus increases the kind of freedom for which, according to one theory, the State exists.

Having dealt with the anarchical solution, we may proceed to deal with its antithesis, the socialistic solution. This is to be distinguished here from what is called “socialistic legislation,” or “State-socialism”; these being merely names applied to any mitigation of anarchy. Socialism, in its proper sense, must be taken to mean the actual conduct, by the central government or its subordinate governments and agents, of all industrial operations. It involves, of course, the substitution of collective for individual property. The purely economical argument against socialism is that it would be less efficient in producing wealth. Work done under the direct compulsion of social authority would be badly done; and absence of the hope that exists where there is room for competition would further depress all energies. When socialism is considered on more general grounds, the argument is urged that private property is essential to individual freedom. Neither of these arguments can really be answered. And the contention that genuine socialism is incompatible with individual freedom is completely confirmed by recent popular literature on the socialistic side. To these arguments it may be added, that socialism has in common with the opposite system the defect of regarding

society too exclusively from the economical point of view. For the industrial anarchist, the State is there chiefly to make sure that the action of economical forces is not interfered with. If these by themselves tend to produce a certain type of society, all that remains for the individual is to adapt himself to it. Bringing other social forces into play is not to be thought of. The tendency of commercial competition is to become fiercer. Let us then consider the type that is most successful under fierce competition and try to become like that. Anything that will "pay" is as "liberal" as anything else if intelligently studied. Then let us study intelligently what will pay. On his side, the socialist would exact from everybody labour which could be proved before some social authority to be useful. And such compulsion would be made practicable, and would be made to press on all alike (except perhaps the officials) by the absence of individual property and free contract. Thus, especially, all serious æsthetic pursuits would be rendered impossible (except perhaps when the favour of authority could be gained). For the socialist, the State exists first as an industrial mechanism, and all that is not industrial is a superfluous accompaniment of its working. In short, consistent socialism, when examined, turns out to be as soulless as plutocracy.

A solution different from either of those that have been discussed is accepted by Positivists and Catholics. This may be called the hierocratic solution. Private property is allowed, but its use is to be ordered in accordance with a uniform religious doctrine theoretically elaborated and applied to practice by a priesthood. Capital, according to the Positivists, is to be "moralised." That is to say, capitalists are to regulate the distribution of wealth in the interests of workmen. This could not be secured without some social power separate from the body of capitalists; and the power is found in a Church. A moral public opinion, practically irresistible by individuals, is to be formed and wielded by an organised "spiritual power" independent of the State. The solution recently propounded for the acceptance of Catholics does not differ from this essentially; though the theological doctrine of the Church in the two cases is of course not the same. One

merit may be acknowledged in this solution. A wider view of society is taken than in the two others. All social activities are recognised, and not simply economical activity. On the other hand, they are recognised only to be controlled by the doctrine and discipline of a universal Church. No amount of material comfort diffused to any conceivable extent is worth this price. To permit either an old or a new Church to take the place claimed for it would involve the suppression of intellectual liberty. Now intellectual liberty, whatever may be the aspirations of the "authoritative" schools, is not a mere incident of a "period of transition," but a permanent conquest of philosophic thought and of the development of the modern State.

The solution which remains to be considered, and which the course of the argument has gradually brought into view, is the doctrine of State-control or State-regulation of industry according to the best ideas and knowledge attainable at the time. This, in distinction from the others, may be called the political solution. It is untouched by any of the arguments that have been fatal to the rest. In essence, it is the doctrine that has been instinctively acted upon both in ancient and modern States. When a mistaken industrial policy was pursued in the past, this was not because the State failed to recognise the limits of its own general sphere of action, but because it was ignorant of some particular law of economics. The remedy is not to exclude as many industrial questions as possible from the sphere of State-action, but to gain the most accurate knowledge of the conditions of particular problems and then to apply it both negatively and positively ; and not simply for the maintenance of prosperity, but for the transformation of the industrial system itself. This does not imply State-ownership of all capital, which is the socialistic solution ; but it implies that no limit shall be recognised to the action of the State upon industry except the knowledge that action would be injurious to the Commonwealth. Where there is doubt there may be action or abstinence from action according to the probabilities of the case. At a time like the present, when the industrial system is comparatively plastic, the bias ought to be in favour of action.

ON THE NATURE OF THOUGHT.

DOES human thought take its origin wholly from practical needs, or is there in it from the first a disinterested element?

Some modern psychologists would say, not only that it takes its origin from needs and is posterior to action, but that it always remains in its whole structure subservient to practical ends. Just as some ancient thinkers held that virtue was simply a kind of knowledge, so for these moderns thought is nothing more than a kind of will; will itself being assumed to be primarily directed to practice. What distinguishes thought from mere trains of associated ideas is that the passive states of consciousness that enter into it are seized upon by an active "apperception," and, by being thus seized upon, are turned into connected "thought-series." The device of these psychologists might be: "*Pro ratione voluntas.*"

If, in opposition, we were to point to the Aristotelian ideal of the self-contained contemplative life, they might admit this to be a possible ideal and still maintain the essential part of their view. Perhaps they would not admit its possibility; but if they did, it would be open to them to insist that the contemplative life is still in a manner active. It is certainly not without volition. At most the volition may be supposed to become in the end unimpeded. And it is undoubtedly an ideal that in more than one way presupposes strictly practical activity in some kind of relation to it. Neither a society wholly devoted to contemplation, nor an individual human life filled with it from beginning to end, is imagined by Aristotle as possible. To decide the question as to the nature of thought, we must consider its origin rather than its consummation.

But first of all, whence comes the notion itself that thought is merely a kind of volition? It is derived, in reality, from a great philosopher; but it seems to imply either a misunderstanding or an exaggeration of his view. Descartes, in the *Principia Philosophiæ*, seeking to explain the causes of error, drew attention very forcibly to the volitional character of some thought. But he does not say that all thought is volitional. The passage where the doctrine may be found is Part i. of the *Principia*, sections 31-36. The doctrine is this. Our errors depend on the will rather than on the intellect. All our modes of thinking (*modi cogitandi*) may be referred to two general ones: perception, or the operation of the intellect; volition, or the operation of the will. Feeling, imagination, and pure understanding, are modes of perception; desire, aversion, affirmation, negation, doubt, are modes of will. (*Nam sentire, imaginari, et pure intelligere, sunt tantum diversi modi percipiendi; ut et cupere, aversari, affirmare, negare, dubitare, sunt diversi modi volendi.*) When we affirm or deny of a thing that which we clearly and distinctly perceive must be affirmed or denied of it, we do not err. But, in order that assent may be given, not only perception but also will is required. Now the perception of the intellect extends only to a few things. It is always finite, while the will is in a manner infinite. There is no possible object of any will that cannot become the object of our will, even though we do not clearly and distinctly perceive it. From extending the will that is involved in judgment to things we do not rightly perceive, arises error.

It is evident that Descartes here does not attempt to explain thought in general as a form of volition, but only judgment in the special sense. From judgment, implying assent or denial (modes of volition), is distinguished pure understanding or pure intelligence which is wholly a "mode of perception," and to volition perception is opposed as another "mode of thought." "Perception" was of course to the older psychologists a vaguer term than it is now. It did not mean simply perception of particular objects. We may take Descartes' "pure intelligence" as meaning very much what we mean by "conception," as distinguished from judgment.

Judgment itself, which is admitted to be volitional, may be explained psychologically in different ways. The question has been put with regard to volition in general, whether it is essentially constituted by a primitive "act of apperception" that cannot be further resolved, or takes its origin from mental elements that do not at first constitute anything that can be called volition. In this last case, "apperception" or "attention" is itself a problem, and cannot be used as a datum of psychological explanation. This is the view of Professor Bain and of Dr. Münsterberg. The view that apperception must be taken as a datum is that of Professor Wundt.

However this controversy may be decided, the question still remains as to the nature of conception (Descartes' "pure intelligence") in its distinction from judgment. Professor Wundt and his disciples would explain not simply judgment but thought in general as a kind of volition; or rather, they would probably say that all thought, in the proper sense of the term, is judgment.

The argument against this view is that it ignores the whole work of modern nominalism. The English nominalists, beginning with Hobbes, set themselves to explain what is distinctive in thought as a whole, not simply in its recognised volitional form, and attained what seems a true psychological solution. They took the essential element in thought to be generality; and the possibility of generalising they explained by the existence of language. To rise from mere trains of association to general conceptions, what is necessary is a system of signs; and this is given by articulate speech. "Speech created thought." One particular perception or image—the sound or memory of a word—can be made to stand for a whole class of other images and perceptions. Man is distinguished from the lower animals by the capacity of evolving such a system. The distinctively human faculty is the power of speech and thought.

This theory has not been sufficiently considered by the apperceptionists. Still, they might conceivably accept it and push the question further back. Language itself, they might say, is the product essentially of will. All thought, therefore, must still be traced to "apperception."

There is, undoubtedly, in all choice of speech, an element of volition; as, in fully formed thought, volition enters into judging. But is volition, in the origin of language, the essential thing? To hold that it is, does not seem to be in agreement with the best view of modern thinkers on the subject, which may be briefly stated thus. Language presupposes society. Given a group of social animals, as soon as uttered sounds aroused by certain ideas call up similar ideas in the minds of those to whom they are addressed, there is the germ of language. This germ consists in understanding, not in intention. Sounds, once understood, can become words. What is needed is the intellectual power that can develop them.

In the case of some languages, this intellectual power seems to have consisted mainly in volition. The suggestion that the Chinese language was essentially volitional in its origin is an obvious one. Leibniz, discussing the old question whether languages are by institution or by nature (*Nouveaux Essais*, bk. iii. ch. 2), remarks that the language of China has been thought to be "entirely arbitrary." This, he proceeds, may be so; but the artificial languages of which we know the origin contain a "natural" as well as an "arbitrary" element. Modern philologists would say that there is something of Leibniz's "natural" element everywhere. Signs, in the beginning, cannot be quite arbitrary, but, to be taken up by others, suppose some kind of correspondence to the thing signified, though not of course a uniform correspondence alike for all men at all stages. In the end, for ordinary speech, words become arbitrary signs, though in the evolution of language they were not so. The reason why the Chinese language seems most of all arbitrary or volitional is its extreme poverty both of vocabulary and grammatical system. Out of about five hundred monosyllables, by changes of tone and of syntactical arrangement, the whole spoken language is constructed. The share of arbitrary choice in the structure becomes conspicuous from the limitation of its material. Yet we perceive that even here the linguistic material cannot have been created by volition aiming at practical ends, but springs originally from

the play of feeling and imagination. Such as it is, an eminently volitional language is in conformity with the intensely positive and practical Chinese character. It is the language of a race with neither poetry nor metaphysics. The copious languages are the languages of races with a larger primitive endowment of imagination or feeling.

Still, this does not settle the question with which we began. Whatever may be the peculiar endowments of different races, is it not always practical need that gives the first stimulus to expression, and so ends by creating thought? That practical needs count for much in the development of thought and language is of course unquestionable. It does not follow, however, that they gave the first impulse. Animals also have "reason" in the sense that they can intelligently adapt means to ends; but in animals the disinterested emotion aroused, for example, by novelty, though not entirely absent, is merely sporadic. In the history of human life, on the other hand, there is, as a rule, a search for the æsthetic before the useful is sought for. Is it likely that language is here an exception? The question is not as to the external occasion on which language arose. As has been pointed out in recent discussion of the subject, the occasion may not always have been the same. The fundamental question is this: What is the internal psychological cause by which it is first determined that there shall be articulate expression at all?

To find a clear solution of this question, we must return to the first of the modern nominalists, to Hobbes. In the treatise commonly known as the *Human Nature*, but recently published by Dr. Tönnies as part of the whole to which it originally belonged, namely, *The Elements of Law, Natural and Politic*, there occurs a paragraph (ch. ix., § 18; ed. Tönnies, pp. 45-46) in which the problem is incidentally solved. Hobbes is treating of the passions he calls "admiration and curiosity," by which, as also by "the faculty of imposing names," man is distinguished from beasts. "For when a beast seeth anything new or strange to him, he considereth it so far only as to discern whether it be likely to serve

his turn, or hurt him, and accordingly approacheth nearer it, or flieth from it; whereas man, who in most events remembereth in what manner they were caused and begun, looketh for the cause and beginning of everything that ariseth new unto him. And from this passion of admiration and curiosity, have arisen not only the invention of names, but also the supposition of such causes of all things as they thought might produce them. And from this beginning is derived all philosophy: as astronomy from the admiration of the course of heaven; natural philosophy from the strange effects of the elements and other bodies."

The luminous suggestion that "the invention of names" has arisen from "admiration and curiosity" is in perfect agreement with the view that derives theoretical science from the same origin. That it is essentially these two passions that set science going and keep it in movement is sufficiently clear from experience. Practical needs lead to applications of the science that exists, and these applications again determine new theoretical problems; but they are not the central cause of the pursuit of science. From this pursuit, the usual effect of practical needs is to draw men away. They may direct the attention of societies to the importance of science, but they will not determine individuals to follow it. To work at science strictly in view of practice keeps it stationary. We see this in the cases of Egypt and Chaldæa, where geometry was kept to the purpose of land-measuring and building, and the stars were observed chiefly with a view to predicting events that had a bearing on national or individual prosperity. The same thing holds of language. Its beginnings were theoretical, æsthetic, disinterested. To a great extent its development depends on persistence of the original impulse; on the leaving of men's minds in some measure free from subjugation to external ends and motives. Literature has a larger vocabulary than daily life. The vocabularies of the Aryan and the Mongolian are at opposite extremes. To develop a utilitarian civilisation too early was to lose possibilities both of scientific and linguistic growth. Language, as Hobbes saw, like the search for causes, springs from what is distinctively human in human

nature ; and this is not direction of the mind to the interests of life. The large part interests play in Hobbes's practical philosophy only makes his position on this point the stronger.

With the question about language, the question about thought, from which we started, is solved.

THE THEORY OF JUSTICE.

THE strong point of modern *a priori* ethical systems has on the whole been the theory of justice. Powerful attempts, such as that of Hobbes, have been made to derive its formulæ and to establish its obligation on experiential grounds, but these have always seemed to leave something unexplained. Among recent theories on essentially the same lines may be mentioned that of W. H. Rolph in his *Biologische Probleme*—a book to the distinctive ethical point of which justice was scarcely done in a review that appeared in *Mind*, vol. x. 281. A later attempt, in conscious dependence on Hobbes, is Mr. Hugh Taylor's *Morality of Nations* (see *Mind*, xiii. 287, 425). This is worked out from the point of view of the special student of society; Rolph's starting point being rather that of the naturalist. The essence of the doctrine in all its expressions is that the formulæ of justice are the result of a conflict among societies, or among individuals; and that they are fundamentally "contractual," and suppose, in their abstract expression, the equality, in the particular relations involved, of the persons contracting. The formulæ, when we appeal, as we must finally, to the ends for which they exist, have an egoistic reference. Their justification is that the interests of the individual are best attained by observing them in all cases.

Although there is a large portion of truth in this theory, it cannot quite maintain itself on its ground of pure egoism. When we suppose the rules of justice established by convention, we have to bring in some element of sympathetic imagination, or some intrinsic social character of men, before we can effectively get our formulæ realised in action. Purely

egoistic social units neither could nor would consistently practise the rules of justice. These rules, if we allow their partial origin in egoistic conflict, must somehow be attached to the sympathetic impulses that issue more directly in another class of virtues. Thus Hume, deducing the virtues of benevolence directly from sympathy, was able to incorporate in his ethics, with some modification, the theory of the egoistic origin of justice. According to Hume, in a society of which all the members were perfectly benevolent, justice would be superseded. It has its true place in a society of which the members are neither wholly selfish nor wholly sympathetic.

If, however, we put justice in a lower place, then we are reducing to a subordinate rank a virtue that seems clearer in its obligation than any other. This is the point that can always be made by the *a priori* thinkers. The experientialist may indeed avoid part of the difficulty by taking the question on psychological instead of on distinctly ethical ground. According to the *a priori* moralist the formulæ of justice are expressive of certain objective relations, and indicate the rule to be followed apart from any consideration of consequences. They have an immediate and intrinsic reasonableness. The equalities and proportions they require are something that ought to be apart from any end beyond themselves. The experientialist, on the other hand, cannot admit that they are obligatory in themselves and apart from all consideration of ends—that is, ultimately, apart from all subjective feeling in any individual. He may, however, give a psychological explanation of their peculiar characteristics. Their appearance of being specially obligatory may be explained as the impress left by the coercive action of the State in enforcing those moral rules that are necessary for its preservation. Their special clearness may be regarded as an æsthetic impression due to a certain quasi-mathematical character they have. The real reason why they have this character is, it may be said, because, in questions of distribution, we must have some fixed rule, and it is easiest to take that which is intellectually simplest. As a psychological fact, there is a certain pleasure in contemplating the relations the rules of justice suppose, and

a certain pain in contemplating their derangement, quite apart from all consideration of consequences. Ethically, any formula would be good that could be got to work, but a formula not admitting of sufficient abstraction and generality fails to impress itself æsthetically. In themselves the laws of justice are simply one set of rules among others, specially important in view of the ends to be subserved by them ; but, in pure ethics, the æsthetic character they derive from their simplicity is not to the point.

Still, after all psychological explanations, an answer has to be given to the rational question why the rules of justice ought to be observed. The experientialist must at last fall back on the position that justice owes its peculiar place in ethics in some way to the end for which it exists.

One great gain that has come to ethics from the theory of evolution is that the necessity of a social basis has been made clearer than it ever was before. Without social conservation no other end can permanently be attained. Hence the virtues by which the social organism is preserved are the most important of all. On evolutionary, as well as on general utilitarian grounds, this position has been assigned to justice. Because of its special importance for social conservation, justice alone, or justice most of all, it has been contended by Mr. Spencer, ought to be enforced by legal penalties. Associations of its infraction with punishment, we may add from Prof. Bain's analysis, cause the appearance to go along with the reality of superior obligation.

Still, it is only on the rougher forms of justice that social stability can be said with truth to depend ; on kinds of abstinence from aggression that are scarcely entitled to the name of a distinctive virtue. Mr. Spencer has pointed out in his *Principles of Ethics* that the distinctive virtue of justice receives no formulation in the moral codes that have ruled over Eastern civilisations. Compassion, in all its forms, is obviously a different virtue from justice ; and so also is strictness in carrying out the precepts of an authoritative code, though this is less obvious. In truth, justice as a special virtue was first distinctly conceived in Greece. Early poets

and thinkers made attempts at its formulation. Plato made an exceedingly elaborate attempt, but in the end defined as "justice" something—namely the performance of its proper functions by each part of the State and by each part of the individual soul—which has never in any community been recognised as the distinctive virtue signified by that name. Aristotle returned to the problem, and succeeded in fixing the general conception as something that relates to distributions of social goods, and as taking for its intellectual basis relations of proportionate equality. In the development of European thought, the increased definiteness it has got since has come to a great extent from analysis of legal conceptions.

What emerges from historical consideration is thus not that justice in the distinctive sense is specially connected with the stability of all societies. Some at least of the Asiatic civilisations have been exceedingly stable. Yet in Asiatic societies the equalities and reciprocal obligations involved in the conception of justice have never come into clear consciousness. On the other side, European States, so far as experience can say up to the present, have been less stable than the more permanent States of the Eastern world; but the conception of justice has appeared, and has received more and more distinct formulation. What ground then must the experientialist take if he wishes to bring justice finally into relation with an ethical end, and is not satisfied with its presentation as an abstract formula bearing its own evidence in its æsthetic or intellectual character?

A ground seems attainable in the following way. The science of society may be considered as having reference either to societies so far as they are merely social aggregates, or so far also as they have political structure. In its general part the science of society might be called anthropology, in its special part political history. There is a corresponding distinction among the ethical virtues. Some have a general social reference; others have also a political reference. Over and above his existence as a unit in the social organism, the individual man may be a member of a free State. Now the ethical virtue of justice has always been under-

stood to have a special connexion with political ends. It has never been found possible to treat it adequately without reference to the State. If, taking it as an ethical virtue, we define it as that virtue which, when observed between individuals, tends to the preservation, or to the establishment, of a State of particular type, then we have a ground for marking it off from the other virtues. Obviously it both becomes distinctly defined in States involving relations between political equals who are also free—whether constituting the whole of the State or not—and, when practised, tends to the preservation of such States. Thus we are able to refer it to an impersonal end which at the same time the individual can regard with desire. If happiness is most attainable in a State that is politically free, then the end has the subjective meaning which, for the experientialist, is inseparable from it. A set of objective relations is indeed involved, as the *a priori* thinkers maintain, but they have somewhere as their accompaniment feelings that spring from the activity of personalities. The subjective end being thus definitely assignable, a ground can now be given from the comparison of societies for placing justice above the other virtues. For it is the virtue that tends to maintain in existence, or to bring about, or to extend, the best type of political society. And, as ancient thinkers saw, only in the best type of political society can the best type of individual existence be realised.

ANIMAL INTELLIGENCE.¹

THE psychology of animals having hitherto been treated only in detached portions, and for the most part in an uncritical manner, Dr. Romanes has "thought it desirable that there should be something resembling a text-book of the facts of comparative psychology, to which men of science, and also metaphysicians, may turn whenever they may have occasion to acquaint themselves with the particular level of intelligence to which this or that species of animals attains." But this is only one of the objects with which he has undertaken the treatment of the psychology of animals. The second and more important object "is that of considering the facts of animal intelligence in their relation to the theory of Descent." The present volume supplies the basis for this mode of considering the facts. "While complete in itself as a statement of the facts of Comparative Psychology," it is preliminary to a second division of the work, which is to be brought out as a separate treatise under the title of "Mental Evolution."

Since the present volume is to be regarded as the first part of a scientific treatise, it is, of course, important that we should know the critical principles on which the facts have been selected. Dr. Romanes has stated these in his preface. It will not be denied that his canons of criticism are sufficiently severe; and in the book itself we do not receive that impression that the facts are being described without careful discrimination, which often makes itself felt in reading collections of anecdotes about animals. But, considering the

¹ *Animal Intelligence*. By GEORGE J. ROMANES, M.A., LL.D., F.R.S., Zoological Secretary to the Linnean Society. (International Scientific Series.) London: Kegan Paul, Trench and Co., 1882.

possibilities of the subject, most readers will look for descriptions which may be scientifically accurate or not, but which, in either case, are interesting in themselves. And, notwithstanding the intention he has expressed, "as far as the nature and circumstances of the inquiry would permit, to suppress anecdote," Dr. Romanes has written a book that is very pleasant to read. Besides this, the materials are arranged in such a way that there is no difficulty in finding any fact that it is desired to refer to.

Dr. Romanes points out more than once "how slightly a psychological classification of animals depends upon zoological affinity, or even morphological organisation" (p. 241). The zoological classification is followed for the sake of its convenience, but at the same time it has, of course, been found necessary to treat some groups in much more detail than others. "Anatomically, an ant or a bee does not require more consideration than a beetle or a fly; but psychologically there is need for as great a difference of treatment as there is in the not very dissimilar case of a monkey and a man" (Preface, x.). As an example of the mode of classifying the facts relating to each group, the chapter on Ants may be referred to. First the researches are described that have been made in order to determine the exact character of the special senses of ants, and of the "sense of direction." After this, the powers of memory and recognition are considered, then the emotions. Then follow sections on the powers of communication, the habits, and the general intelligence of ants. Lastly, there is a short section on the nervous system and the sense organs; but this is not represented in the chapters dealing with other animals.

Though the complete theoretical treatment of mental phenomena in animals does not belong to the present volume, yet there is in the Introduction some discussion of theoretical questions. This was indeed necessary in order to arrive at a provisional mode of grouping the facts. For it has been objected to those who speak of the "emotions" of an ant or a bee, for example, that we are not justified in applying terms derived from human psychology to animals so remote in

structure from the human type. Dr. Romanes replies to this objection by showing that the ground of all inferences as to the mental processes of animals is an argument from the analogy of their actions with our own. "Now it is, of course, perfectly true that the less the resemblance the less is the value of any analogy built upon the resemblance, and therefore that the inference of an ant or a bee feeling sympathy or rage is not so valid as the similar inference in the case of a dog or a monkey. Still it *is* an inference, and, so far as it goes, a valid one—being, in fact, the only inference available. That is to say, if we observe an ant or a bee apparently exhibiting sympathy or rage, we must either conclude that some psychological state resembling that of sympathy or rage is present, or else refuse to think about the subject at all; from the observable facts there is no other inference open" (p. 9).

Assuming that we are justified in concluding that the mental processes are similar when there are similar external appearances, we still need a criterion of mental as distinguished from reflex action; for we find both in men and animals examples of actions that are "mind-like and yet not truly mental." "Objectively considered, the only distinction between adaptive movements due to reflex action and adaptive movements due to mental perception, consists in the former depending on inherited mechanisms within the nervous system being so constructed as to effect *particular* adaptive movements in response to *particular* stimulations, while the latter are independent of any such inherited adjustment of special mechanisms to the exigencies of special circumstances" (p. 3). The criterion proposed is therefore—"Does the organism learn to make new adjustments, or to modify old ones, in accordance with the results of its own individual experience?" If it does, we have evidence that the limit of non-mental action has been passed; that is, we are able to fix, by means of this criterion, "the upper limit of non-mental action." After distinguishing reflex from mental action, it remains to distinguish "instinct" from "reason." Dr. Romanes proposes to define instinct as "reflex action into which there is imported the element of consciousness," and "reason or intelligence" as

"the faculty which is concerned in the intentional adaptation of means to ends" (p. 17).

Dr. Romanes, in his Introduction, defends these last definitions against several objections, but the strongest argument that can be brought against them is found in the actual treatment of the phenomena of instinct and "general intelligence" in the chapters that follow. In discussing, for example, the question of the general intelligence of ants, Dr. Romanes speaks of "the difficulty of drawing the line between purposeless instinct and purposive intelligence." He then goes on to say, "It will be remembered that our test of instinctive as distinguished from truly intelligent action is simply whether all individuals of a species perform similar adaptive movements under the stimulus supplied by similar and habitual circumstances, or whether they manifest individual and peculiar adaptive movements to meet the exigencies of novel and peculiar circumstances" (p. 123). Now this distinction between instinct and reason, when it comes to be applied, does not seem to be essentially different from the distinction between mental and reflex action. The distinction of instinct as having an element of consciousness from mere reflex action which is unconscious, seems to vanish in the actual treatment of the subject; and the way of answering the question as to instinct that suggests itself most strongly is to define it with Mr. Spencer as "compound reflex action," placing both instinct and reflex action, as merely mechanical processes, in opposition to all conscious action.

If we take this view, we must regard all animals from the lowest to the highest as having a certain measure of "general intelligence." In the higher animals this general intelligence may be as highly developed as the mechanical processes described by the term instinct. For example, Dr. Romanes says, in speaking of the beaver, "It is really impossible by the closest study of the psychology of this animal to distinguish the web of instinct from the woof of intelligence; the two principles seem here to have been so intimately woven together, that in the result, as expressed by certain particular actions, it cannot be determined how much we are to attribute

to mechanical impulse, and how much to reasoned purpose" (p. 367). Now there seems to be an advantage here in confining the term instinct to the mechanical processes and calling all the rest "general intelligence." And Dr. Romanes, except in the Introduction, seems to have looked upon the facts in this way. But in considering the question how the terms should be defined, the difficulty no doubt presented itself that reflex action, instinct, and reason are usually thought of as an ascending series. This, however, is merely because the animals in which reflex, instinctive, and rational action respectively are most prominent, form an ascending series in the scale of intelligence. The difficulty disappears when we regard all animals as having some general intelligence; for we can arrange them in an ascending series (as Dr. Romanes proposes) according to the amount of consciousness possessed by them; contrasting all along the line "non-mental neuromuscular adjustment" (simple or "reflex," and compound or "instinctive") with the mental life properly so called.

That all animals have some consciousness, some "general intelligence," is regarded as probable by Dr. Romanes; and perhaps the most interesting portions of the book are the early chapters in which he proves the presence of an element of consciousness in animals very low in the zoological scale. "Even the headless oyster," he quotes from an unpublished MS. of Mr. Darwin, "seems to profit by experience." And this power of profiting by experience, it must be remembered, is the test of rational as distinguished from instinctive action. But we find evidence of conscious purpose even below mollusca. Dr. Romanes records an observation made by himself on rotifers, and says that if we were to depend upon appearances alone, this one observation would be sufficient ground for attributing conscious determination to these microscopical organisms (p. 19). Then, after quoting "some observations relating to the lowest of all animals and made by a competent person," he remarks that "although we may suppose that the adaptive movements described by Mr. Carter were non-mental, it still remains wonderful that these movements should be exhibited by such apparently unorganised creatures [*amœbæ*]

seeing that as to the remoteness of the end attained, no less than the complex refinement of the stimulus to which their adaptive response was due, the movements in question rival the most elaborate of non-mental adjustments elsewhere performed by the most highly organised of nervous systems" (p. 22).

Now these phenomena, if they are ascribed to mind at all, certainly cannot be ascribed to instinct. And it is scarcely possible, consistently with the principles laid down by Dr. Romanes, to deny that they are mental. It therefore seems as if we must admit the presence of the intelligent and volitional element in Protozoa; and this view suggests itself more strongly when we consider the nature of the movements of these animals, and when at the same time we remember Mr. Spencer's description of instinct passing into intelligence by losing its perfectly unhesitating or "automatic" character.

In the higher (as regards morphological organisation) but less plastic animals Cœlenterata and Echinodermata, Dr. Romanes finds nothing that cannot be explained as reflex action. Taking this into account along with the facts already mentioned, we may infer that the opposition between intelligent and mechanical action which shows itself in the tendency of each to encroach on the region possessed at any particular time by the other, is present from the beginning of life; and thus the division of all that is included in mind into free intelligence and organised habit (instinctive or reflex) subordinate to it, is seen to be preferable to the division into reflex action, instinct, and reason.

The kind of opposition that must always exist between these two things when they have become distinct may be made clear by bringing together the general results of the chapter on Instinct in the *Origin of Species*, and of those portions of Mr. Spencer's *Principles of Psychology* mentioned by Dr. Romanes in his Preface. Mr. Darwin showed, in the chapter referred to, how the most complicated instincts may be formed out of purely reflex actions by natural selection: and Mr. Spencer had already shown in the first edition of the *Psychology* how instinctive processes pass into rational processes

when they become too complex to be performed unhesitatingly; and how, on the other hand, rational processes when they are often repeated become habits, and may at length be fixed by heredity as secondary instincts. More recently Mr. Spencer has shown grounds for thinking that natural selection is most important in the early stages of evolution, while the formation of habits which at first are conscious, but at last pass into instincts, is most important in the later stages of evolution. But in any case we see here both the continuity of instinct with reflex action and the constant opposition that there is between mechanical quasi-mental action and free intelligence. On the one hand the organism tends to become excessively specialised by the development of instincts under the influence of natural selection and by the formation of habits; on the other hand rational processes are constantly being applied to slightly different material, thus becoming more varied, and instincts when they become too complex are partially disorganised and contribute their share to the activity of the free intelligence. Thus, starting with a lowly organised animal having the beginnings of intelligence and reflex action, that is, having the germs of the mental and quasi-mental processes of the higher animals, we observe from this point onwards both a process of development of each kind of action along its own line and a process of transformation of each kind of action into the other.

In some ancient civilised societies of men, habits which were originally special applications of reason to particular ends have encroached to such an extent on the free intelligence that almost the whole of life has become mechanical routine. If the specialising tendency can go so far in the case of men, may we not expect to find animals rather high in the zoological scale (perhaps some species of insects) in which *all* the mental activity has passed into the form of instinctive processes? The complementary problem to that of finding evidences of intelligence in the lowest animals would be that of finding evidences of the absence of intelligence in the higher animals. In discussing ants Dr. Romanes remarks that some species do not seem to have general intelligence in proportion to the

complexity of their instincts, though "other species . . . appear to be as remarkable in this respect as they are in respect of their instinctive adjustments" (p. 127). But if there is constant struggle between instinct and intelligence, an animal in which instincts have been fixed so rapidly that all the plastic intelligence has been absorbed in forming them is quite possible, and might be found perhaps among insects. Such an organism would be a realisation of the idea of Descartes that animals are unconscious automata.

ÆSTHETICS.¹

ALTHOUGH it cannot be said that no contributions have been made in England to the theory of Æsthetics, we have certainly nothing to put beside a treatise such as the present. English criticism of art has usually taken the form of isolated suggestions worked out in a limited field rather than that of systematic theorising on the whole subject of art. This may by some be considered an advantage, as making easier for the critic the purely receptive attitude towards works of art—the fixing of the attention on the impression received without any attempt at judgment of it by arbitrary rules such as were laid down by English and French critics of the last century; and, no doubt, there is some advantage in this attitude as compared with that of the older schools of criticism. At the same time the absence of accepted philosophical principles carries with it greater disadvantages. The present work is well fitted to make clear how much is gained by treating art from a philosophical point of view. It has, besides, the merit of combining with philosophical method an appreciation of art for its own sake and a power of expression sufficient to have made the author's reputation as a purely literary critic. One of the best features of the book is that, whenever it is possible, the judgments of artists on their own art are taken as the basis of the exposition; and perhaps the great advantage that a German has over an English critic, in

¹ *Æsthetik*. Die Idee des Schönen und ihre Verwirklichung im Leben und in der Kunst. Von MORIZ CARRIÈRE. Dritte neu bearbeitete Auflage. Erster Theil. "Die Schönheit. Die Welt. Die Phantasie." Zweiter Theil. "Die bildende Kunst. Die Musik. Die Poesie." Leipzig: F. A. Brockhaus, 1885. Pp. xxii., 627; xiv., 616.

an attempt to treat systematically the science of æsthetics, consists in his having behind him a far larger body of theorising by artists themselves both on art in general and on the limits of the special arts.

The mode of treatment adopted in the present work will be best understood from a sketch of the author's general view ; but before proceeding further it may be well to give the briefest possible indication of the chief divisions of Prof. Carrière's book. The more general problems of the philosophy of art, the definition of beauty, the relation of beauty in art to beauty in nature, and the character of æsthetic ends as distinguished from other ideal ends are the subjects of volume i., the three sections of which are entitled (1) "The Idea of Beauty," (2) "Beauty in Nature and Spirit ; the Material of Art," and (3) "Beauty in Art." This general Part is followed by the treatment of the particular arts in volume ii., where they are grouped under the heads of "Plastic Art," "Music," and "Poetry."

"The Beautiful" is defined, at the opening, as the harmony of the manifold of feeling and the unity of the idea in a sensible form the perception of which gives immediate pleasure. The element of feeling in art is the individual or personal element, which is the element of concrete reality. It is by reason of this element that a work of art is incapable of complete analysis. The union of the ideal with the sensible element in beauty is manifested in this, that, while beauty cannot be demonstrated to another but must be felt by each, yet at the same time each seeks to obtain from others agreement with his own æsthetic judgments. Beauty as it is perceived in nature is superior to the beauty of art in so far as art cannot completely reproduce all the impressions that are got from any natural object ; on the other hand, impressions of beauty occur scattered in nature and can only be obtained at different times and from selected points of view. Art, by the action of the "phantasy" or shaping imagination, collects these scattered impressions and gives to the ideal it has created an embodiment in an individual form. The phantasy has the mediating function in relation to the unity perceived

in beauty that is ascribed by Kant to the faculty of imagination in relation to the reason and the understanding. Ideal beauty is for the "phantasy" what the concept is for the reason, what the idea of good is for the will. The world of sensible appearances, which provides the phantasy with material, has more significance for the artist than for the man of science, whose interest is in the general, or for the man of action, to whom the internal disposition is the chief thing. The end of art is to bring into harmony "the manifold of feeling" and "the unity of consciousness" in a perfectly individualised concrete form. It is thus equally distinct from the ends of science and of morals, although the same ideal unity is expressed in all three.

What is to be remarked especially in the author's treatment of his subject throughout is that the distinction between the æsthetic, the scientific and the ethical points of view which he states in the form of a general principle is kept perfectly clear in practice. It is not unimportant to draw attention to this point, for here more than anywhere else the advantages of the philosophical treatment of æsthetics become obvious. The distinction of art, science and morals is indeed a current one in England as elsewhere. But if men of science—the word "science" being taken in its widest sense—are no longer required on every occasion to re-establish the distinction between their own and the ethical point of view, certainly artists are not in the same fortunate case. We need not go far to find the maxim of "art for the sake of art" treated as a slightly immoral paradox. To quote it in the original French is usually considered an aggravation of the offence against ethics implied in the statement of it. More than ever instructive is it, therefore, to find a German writer who, as we shall see, cannot be accused of neglecting or undervaluing the ethical side of things, treating this formula in effect as a postulate of æsthetic science and of all actual artistic work. Beauty, Prof. Carrière says, is its own end and must be loved for its own sake. "No other demand, therefore, may be made of art than that its work shall be beautiful. He who would turn aside the work of the artist for other ends and make it

serviceable to other aims takes away the freedom of art and lowers that to a means which fulfils its destination only as an end for itself." The security in the statement of this position and the consistency with which it is taken as a basis throughout can only be explained by the habit of considering art in the light of philosophical principles. From the philosophical point of view it becomes clear at once that in whatever sense truth and virtue are ends in themselves, in the same sense beauty also is an end in itself.

The character of æsthetic contemplation most generally recognised is "disinterestedness." This character has been made use of in psychology to distinguish æsthetic pleasures from mere impressions of sense and the pleasures of "the æsthetic senses" from those that have not the æsthetic character because they are not capable of being shared. Prof. Carrière, while not omitting to bring this out clearly, suggests further application of the character of disinterestedness in the distinctions he draws between the artistic modes of expression and those that are related to them but are of a mixed character. An example of this kind of application is given in the course of a discussion of the relations of poetry to the artistic modes of prose (ii. 501-4), which follows an account of the separation of verse as the language of art from prose as the language of science.

When poetry and philosophy (which at first included science) were as yet undistinguished, their common organ of expression was verse; afterwards, when the desire was felt to describe in detail objective facts, of history and of nature, prose, the language of daily life, was elaborated into a new organ of expression adapted to this new purpose. As knowledge returns to unity, as more and more laws come to be grouped under a single law, it again becomes possible to make science the material of poetry, to express truth in the rhythmical form of emotional speech. Not only is this so, but all along the relations of poetry and science are closer than those of science and the other arts. Thus the writing of history, for example, is susceptible of an artistic form comparable to that of epic poetry. And the dialogues of Plato, so far as living persons

are represented in them having individual features, are related to dramatic art. The historian, however, is restricted by facts and by the actual order of events; and the end of philosophic writing is not the concrete presentation of character, but truth in its generality. Here therefore the artistic element either expresses itself imperfectly or is something extraneous to the end of the writer. Again oratory, in its emotional element, has a certain resemblance to lyric poetry. But in listening to an oration the mind is not allowed to rest in æsthetic enjoyment; an appeal is made to the will: hence poetry does not permit the rhetorical except as an element in a whole, as for example in the drama.

It has been said that the true antithesis of poetry is not prose but science. Prof. Carrière's discussion of the relations of the various forms of literary art shows us in what sense this may be accepted. We may say with a certain truth that prose is antithetical to poetry not in itself, but only in so far as it is the organ of science; but we may equally well select another use to which prose may be put, namely, its use as a means of influencing action, and oppose this at once to its artistic elaboration and to its use as a means of communicating knowledge. In this way we arrive at rhetoric as a second antithesis to poetry. This antithesis is better than the first; for, as has been seen, it is especially by the absence of disinterestedness that oratory is distinguished from lyrical verse; and disinterestedness has been selected as pre-eminently the character of art. On further reflection we find that this character of disinterestedness ought not to be taken absolutely as the character of art, but is really common to it with science and philosophy. Now rhetoric, with respect to this character, is equally opposed to philosophy and science on the one hand and to art on the other. And the best critics have found the rhetorical spirit as inconsistent with the spirit of poetry as it is with the spirit of philosophy. On the contrary there is no absolute inconsistency between poetry and science. A truth of science, as Prof. Carrière says, may become poetical under impassioned contemplation.

The element of "strangeness" in beauty, referred to in a

well-known passage of Bacon's *Essays*, has of late played an important part in æsthetic theories developed from quite different points of view. It has been made by literary critics the distinctive character of Romantic art, and by Darwin (in the *Descent of Man*) the starting-point of the earliest development of æsthetic feeling in the human race. Both these views have points of contact with Prof. Carrière's account of the origin of art. The mind, he says, in order to obtain æsthetic pleasure from the forms of external things, has need of the stimulus of the unaccustomed. An example of the pleasure thus obtained is seen in the morbid attraction of the horrible and of all strong stimulation (i. 10, 254). The emotion obtained from the unaccustomed does not, however, in itself constitute æsthetic pleasure. There is need further of a return of the mind on itself after its movement outwards, a calming of the internal agitation caused by this movement. Art brings about that union of "the idea" and of "feeling" in which the harmony of beauty consists by first increasing the intensity of conflicting feelings and then imposing on them "a law of measure," a law in which "freedom" and "order" are reconciled.

Joy in the harmony of beauty proceeds from perception in this harmony of the completion of our own being, the accord in ourselves of nature and spirit, of unity and multiplicity. It has been rightly said that man first perceives external beauty under the form of human personality; hence the personifications in mythologies. And, although afterwards the conception of beauty becomes universalised, it always remains true that as without spirit there is no beauty, so also there is none without sense.

In all the arts equally there is reconciliation of nature and spirit, of sense and the idea; but this reconciliation is effected in different ways. Plastic art is objective, as being a representation of bodies in space. Music is subjective, as having feeling for its content and time for its formal condition. Poetry is especially "the art of the spirit"; uniting the forms of plastic art, "the art of nature," and of music, "the art of feeling." Poetry differs from music and the plastic arts in starting with

thoughts instead of feelings or images; but the thoughts expressed by the words of a poem are not there simply for their own sake, but in order to produce in the minds of others the images and feelings that are in the mind of the poet. A poem, both as a whole and in every part, is the expression of a thought in the concrete form of imagination; as a whole and in every part it is also submitted to a musical law, a law of unity in change, which corresponds to a law of the fluctuations of feeling. The author finds in the history of the arts a support for his classification; contending that the objective arts, or arts of nature, are the first to attain perfection, then the subjective arts, or arts of feeling, and lastly those in which there is a balance of the two elements. The same classification is applied to each group of arts in turn. Of the plastic arts architecture is said to be predominantly objective as deriving its forms from external nature; sculpture in a sense subjective, since it begins with the human form, treating this as an expression of the human spirit; while in painting there is co-existence of the objective and the subjective points of view. Music, on the same principle, is considered under the heads of "instrumental music," "vocal music," and the "combination of vocal and instrumental music" (in opera, &c.). Lastly, poetry is regarded as objective in the epic, subjective in the lyric, and as a union of epic and lyric elements in the drama.

The general principles here may be traced to Lessing's *Laocoon*; the grouping of the particular arts and the theory of the three stages of art to the influence of Hegel. These last cannot be regarded as an established part of æsthetic science, as the principles derived from Lessing can; but at least they give occasion for abundance of interesting comparison of the methods of the various arts and their diverse modes of treatment of similar subject-matter. It is, however, a curious example of the power of theory to modify the facts when, in the middle of an interesting passage on the relations of artistic genius to its predecessors and to the past development of the race, we find the author illustrating the general law of dependence by a remark which implies that the culmination of dramatic art in Shakespeare was impossible till the epic and the lyric

had been perfected in English literature (i. 537). At the same time, while a law of the development of poetic art seems here to be forced on the facts rather than inferred from them, no attempt is made in Prof. Carrière's classification to subordinate one art to another in accordance with this law. Each is said to be, in its own manner, an expression of the whole. This absence of any attempt to place the arts above or below one another in rank is an example of avoidance of the dangers of the method of purely speculative deduction, to which, indeed, it was from the first the author's aim to oppose a more concrete treatment of æsthetic questions.

According to the author's view, the ideal unity expressed in art, in science, and in religion is essentially the same. But here again, as has been seen already, he does not subordinate any one of these ideal ends to another. Indeed, he says explicitly, "Art, Religion, Science, each of these in its kind is a highest point, a summit of human life." The metaphysical doctrine stated above implies, however, that each ideal has relations to the others; and in one place beauty is described as the completed form, in the world of appearances, of the true and of the good. In all art we are to see the reconciliation of the principles of order and freedom, and in the drama especially the reconciliation of the individual with the moral order of the world.

Since the drama, in the author's view, if not the supreme, is yet the most developed form of poetic art, as poetic art is of art in general, this application of his metaphysical doctrine may be selected for special examination. But first of all it is necessary to point out that whether this theory be accepted or not, it in no way implies a departure from the most general principle of æsthetic criticism, that art must be judged according to its formal quality. For this theory is an attempt to determine the relation of matter to form in art, not an attempt to substitute judgment on matter for judgment on artistic form. It affirms that actually the highest types of dramatic art, already accepted as such on grounds distinct from any opinion about their meaning or purpose, will be found as a matter of fact to contain a reconciliation of man with the external order, and

that this order is conceived by the dramatist, consciously or unconsciously, as ethical. The hero of a tragedy, according to this view, is represented as triumphing (at least subjectively) by submission to the moral order of the world, or as crushed through resisting it. The same theory is applied by the author to comedy. The reconciliation that is the end of the drama is here brought about in the mind of the spectator by the representation of that which is really deserving of contempt as in conflict with the moral order, and in presence of this, the true reality of things, as appearing in its intrinsic nothingness.

A theory such as this is not open to the objection that it is a direct application of ethical canons to art; and we may admit that Prof. Carrière's theory explains some dramatic effects. To take an example from tragedy, the background of *Macbeth* is undoubtedly a moral background. But when we try to apply this theory, say to *Hamlet* and *Lear*, especially the last, it seems less adequate. An interpretation of these plays in terms of an ethical theory of things can only be carried out (as Prof. Carrière tries to carry it out in the case of *Lear*) by the selection of episodes. For in these most of all among modern dramas we are made conscious that behind "the moral order of the world," the creation of the human spirit, are the elder powers—"Fortuna omnipotens et ineluctabile fatum." Perhaps fate is most prominent in the ancient, fortune in the modern drama. And the fate of the Greek dramatists has in general more of an ethical character than the impersonal background of Shakespearean tragedy. An illustration of this distinction may, however, be found in *Macbeth*, where the ruling conception approaches nearer than elsewhere in Shakespeare to the Greek fate. But in the ancient as well as in the modern drama the ethical character belongs rather to the hero of the tragedy, who is brought into conflict with a non-moral order of things, than to anything in the external order itself. What is said, in this mode of considering it, of tragedy, ought to be applicable, in Prof. Carrière's view, to comedy also. Now when we consider the higher kinds of comedy and the humorous treatment of things generally as opposed to the tragic, is there not just as much difficulty in reconciling his theory, say, with the treat-

ment of life by Cervantes and Molière? Can the non-ethical character of the background of human life be brought out more strongly than it is, for example, in *Don Quixote* and in *The Misanthrope*?

This does not mean that the higher forms of art contain no solution of problems that are at least in part ethical. It shows, however, that the view taken of the final questions of æsthetics must depend to some extent on the kind of philosophy we start with. Perhaps the objection may be made here that the questions now touched upon, whether the author's view or that which has been suggested in contrast with it be accepted, are not properly æsthetic questions at all; that the irrelevant consideration of subject-matter has been introduced in a new shape—if not by the application of ethical tests to art, then by the application of metaphysical tests. The reply to this objection has been partly indicated above. The question discussed is not "What is the true conception of the universe?" but "What is the ruling conception in works of art already admitted to be highest in their kind?" And it is not proposed to pass judgment on a work of art according as it embodies a true or a false theory of things. The value of a work of art, it is acknowledged, must be decided by the æsthetic impression got from it and by nothing else. At the same time, any one taking this view may or may not hold that, as a matter of fact, in the highest poetry a true theory of things will be found implied.

It is not, however, in any theory of the relation of artistic form to different kinds of philosophical or ethical content, in whatever way such a theory may be understood, that we ought to find the characteristic doctrine of a treatise on Æsthetics. The central idea of Prof. Carrière's book is rather to be seen in his manner of viewing beauty as consisting in a certain unity of idea combined with vividness of distinctly individualised feeling expressed in concrete form. It is difficult to see how the elements of the general conception of the beautiful could be better indicated than in Prof. Carrière's formula; and he never allows this formula to become a mere generality, but constantly applies it with success to the decision of actual æsthetic questions. We have, for example, an interesting

application of one part of the formula when he explains the strength of the impression made by the depth of meaning and clearness of form of the masterpieces of Greek tragedy from the repeated introduction on the stage of the same myth and consequent absence of interest either on the part of the dramatist or the spectator in the subject-matter as distinguished from the form. In confirmation of his view of the subordinate position of "invention" as an element in poetic art, he points out that modern dramatists also have seldom invented their plots, but have taken their material as much as possible from history or from stories already extant. Thus the modern as well as the ancient dramatist has been able to gain freedom to impose on his special subject-matter the unity of idea characteristic of all art. But while this unity is shown to be an essential element in a work of art, we are never allowed to forget that there is also a concrete element, the element of personality. For the assigning of minor artistic significance to interest of plot and to details of life does not, with the author, tend to pass into an exaltation of the element of generality such as would make art merely the expression of an idea and nothing more. The individual element in art, indeed, is not this element of fact, of actual detail of life to which a lower place is given, but the element of vivid personal feeling. The artist has to select impressions both of inner and outer experience and impose on them the law of his own personality; and this, as Prof. Carrière shows, is what constitutes "style" in the most general sense. In his discussion of such problems as those of style and of artistic "inspiration" nothing can be better than the way in which he assigns their due place to the unconscious and the conscious elements in genius, and to innate faculty and acquired dexterity in all kinds of artistic production. The historical relations of the artist, too, are extremely well treated. It is a favourite idea of the author, as it has been of other writers on art, to regard the artist as the organ of his time and of his race, in whom at length both his own age and the past of which it is the product have become articulate. In this view, of course, the obligations of the artist to his predecessors and his relations to the knowledge and ideas of his time

are not forgotten. Sometimes even, as was pointed out in one case above, this historical view leads to a certain exaggeration of the dependence of the individual man of genius on the completion of previous stages of artistic progress. But here again it is made clear that the individuality of the artist is after all the chief thing; that the personal element must always be superimposed on the character of the artist as an organ of the race. This is especially well brought out in the section on "Style," where a distinction of Goethe is developed into a theory of the relation of mere "imitation of nature" on the one hand, and of the exaggeration of a personal "manner" on the other, to the balance of a true "style," in which the personality of the artist is fully expressed but always in such a way that the object is treated appropriately and that the universal or typical element is clearly seen through the individual expression in beautiful form.

It would be easy to multiply examples of the author's felicitous applications of his general view in comparisons of the effects of the different arts; such as his illustration from painting and sculpture of the different kinds of unity required by the epic, "the poetry of event," and the drama, "the poetry of action" (ii. 545, 587): but without references to more special discussions, which, besides, would only give an inadequate idea of the interest of these volumes, enough ought to have been said already to show the importance of Prof. Carrière's book alike for literary and for philosophical criticism.

ON THE ETHICS OF NATURALISM.¹

IN the present state of ethical speculation this book—which gives, in revised and enlarged form, the lectures delivered by Mr. Sorley, as Shaw Fellow, in the University of Edinburgh—is of peculiar importance. Even if it is from the “naturalistic ethics” which the author finds inadequate that we expect the best definite results, yet criticism may be admitted to be more valuable just now than new developments. For the ethical theories founded on the doctrine of evolution are in part inconsistent with one another; and, as Mr. Sorley makes prominent, some of them are claiming to supersede rather than to continue the hedonistic ethics of the earlier stages of “naturalism” or experientialism. Those experientialists, therefore, who are desirous of finding in what direction their general doctrine of morality ought to be developed cannot do better than study such a thorough and careful criticism of that doctrine as is offered in Mr. Sorley’s book.

The essence of a great part of Mr. Sorley’s criticism is contained in the following passage:—

“The ethical writings of the evolutionists often confuse the problems of history and theory in a way which presents the same difficulty to the critic as the works of the corresponding school in jurisprudence. . . . Every one is now familiar with the evils of hypothetical history, and with the iniquity of the proverbial philosophic offence of constructing facts out of one’s inner consciousness. The historical jurists deserve no little credit for the thoroughness with which this has been enforced by them; perhaps too the same lesson may be learned from the facts of the development of morality. But it may be questioned whether we are not at the present time more apt to confuse fact and theory in the opposite way: whether the

¹ *On the Ethics of Naturalism*. (“Shaw Fellowship Lectures, 1884.”) By W. R. SORLEY, M.A., Fellow of Trinity College, Cambridge; and Examiner in Philosophy in the University of Edinburgh. Edinburgh and London: W. Blackwood & Sons, 1885. Pp. 292.

science of law is not sometimes lost sight of in the history of legal institutions, and ethics in danger of being identified with the development of moral sentiments and customs." (Pp. 114-5.)

The same criticism in other forms is brought against the utilitarian doctrine and against "egoistic hedonism." All naturalistic theories alike confound investigations of what is or has been with the determination of what ought to be. A separate chapter is devoted to the "ethics of moral sentiment" of Shaftesbury and Hutcheson, which is found to occupy an insecure position between the empiricism or naturalism that "denies to reason any spontaneous or creative function" and the opposing theory of rationalism. By no naturalistic or semi-naturalistic theory, the argument runs, are we enabled to pass from the point of view of science to the point of view of morality. Only the doctrine that ascribes spontaneity to Reason, that sees the reality of things as a system of relations in a universal self-consciousness, and that introduces the notion of end or purpose into its view of the world as a whole, can furnish a valid philosophy of ethics.

In the part of his book that deals specially with the hedonistic theories, Mr. Sorley puts very well most of the arguments that have been urged against utilitarianism as an ethical doctrine and against its psychological basis. It will be best, however, to pass rapidly over this portion of the work. Hardly any one who accepts the theory of evolution can hold that this theory makes no difference to the position of utilitarian ethics; and Mr. Sorley himself believes that evolution has come not to fulfil hedonism but to destroy it. His chapters on the theory of evolution, therefore, are those that it is desirable more particularly to examine.

Perhaps Mr. Sorley attaches too much importance to the rejection of hedonism by some evolutionists. Especially in modern times the ascetic bias is a constant cause tending to prevent moralists from being avowedly hedonistic; and the appearance of a new scientific theory, with important ethical bearings, naturally had for one of its earliest consequences stimulation of the research for a non-hedonistic basis of morals. Hence we need not regard this opposition of evolu-

tion to hedonism as inherent in the theory itself. Doctrines such as those which make "work" or "efficiency" or "complexity" ends in themselves are partly expressions of the ascetic bias, partly, we may suppose, voluntary illusions intended by their authors as prophylactics against pessimism.

But Mr. Sorley, of course, does not confine himself to the argument from the actual developments of evolutionist doctrines in ethics. Standing over against the non-hedonistic theories, there are the more important systems of Mr. Spencer and Mr. Leslie Stephen. Much criticism is devoted to showing the inadequacy of these attempts to combine hedonism with evolution. Mr. Sorley candidly admits that he is not convinced by the pessimistic arguments; but he contends that, since an exact proportion between progress and pleasure has not been shown, "we must make our choice between evolutionism and hedonism."

If we decide for "evolutionism" three interpretations of it are possible. The end may be stated as "increase of adaptation" or as "increase of complexity" or as "increase of life." But none of these formulæ can give us any independent ethical ideal. Notwithstanding the attempts of evolutionists to explain the notion of "higher," which, both as applied to conduct and to pleasure, has been taken by the hedonistic schools from current moral opinion, they have not succeeded in getting at any fixed point of view of their own for judging rationally what kinds of conduct are really higher in the scale of development. We must therefore quit the ground of "empirical evolution" as incompetent to determine practical ends, and pass to the view of evolution as the expression of an internal teleology.

Mr. Sorley's conclusion as to the relations of pleasure and progress does not seem quite sufficient to prove the incompatibility of hedonism and "evolutionism." Such an "exact proportion" as he requires is unnecessary. The theories of Mr. Spencer and Mr. Stephen ought really to be regarded as "hedonism with evolution," not as an "alliance" of two independent doctrines called "evolutionism" and "hedonism." Considered simply as rational doctrines of the end of conduct,

they are hedonistic ; the theory of biological and social evolution is to them only an aid for determining the *axiomata media* of ethics. The questions to which, in order to maintain themselves, they need an affirmative answer are, according to Mr. Sorley, these : " Is hedonism, as Mr. Spencer affirms, a form of thought in ethics ? " and " Can the theory of evolution give us any aid in determining what kinds of conduct contribute to the end as already fixed ? " Obviously the second question is subsidiary to the first, not co-ordinate with it. But before considering these points more closely, it will be best to describe Mr. Sorley's positive contribution to ethical theory.

His teleological view of evolution (which is not to be confounded with the old " external " teleology) leads him to affirm as the end of man " self-realisation." The transition from the point of view of science to that of morality, which has been found not to be possible empirically, is possible " transcendently through self-consciousness," because " in self-consciousness we reach the element of identity between knowledge and action." For " the ultimate self-consciousness," knowledge and action are indistinguishable. The being of things and their teleological determination by the absolute Reason are one and the same. For " the finite self," on the other hand, there is a distinction between knowledge and action, " correct if not pushed to the extent of making an absolute separation between them." In human beings " conscious volition only follows a conceived want, a recognition that the self as imagined—the ideal self—is not realised in the actual self. The action is towards a fuller working out of the idea of self ; and the end may therefore, in all cases of conscious action, be said to be self-realisation." This end " must not be looked upon as a feeling—for, if it is, it can only be interpreted psychologically as pleasure—but as simply conscious self-realisation." It is the idea of a progressive self-realisation that makes the notion of evolution intelligible.

Is there any escape here from Mr. Spencer's proposition quoted above ? To decide this, we have only to ask how self-realisation, if it has no subjective accompaniment of feeling

which is regarded as preferable to other feelings, can be itself an object of preference. It may be said that this feeling exists indeed, but is not part of the end. On the principles of Mr. Sorley's philosophy, however, this exclusion of feeling from a state of which it is the inseparable accompaniment seems to be an illegitimate "abstraction." Of course there is a meaning in the practical direction to think of self-realisation rather than of the feeling that accompanies it (or is part of it); but, because this is a useful practical direction, it does not follow that a certain type of feeling is not ultimately the test of self-realisation, or even (as some hedonists have held) that this feeling is to be excluded as much as possible from conscious thought.

Mr. Sorley's theory has no more power than the theories of evolutionists to evade the hedonistic test. And by the application of this test to every theory in turn we obtain proof of the necessarily hedonistic character of all determinations of the end of conduct. For the rest, the formula of "self-realisation" may be admitted to be better than most of the alternative formulæ. It is in some respects superior to "altruism"; for, if this points more directly to the social character of the ethical end, "self-realisation" has the merit of insisting more on the worth of the individual life. And, unless the individual life has a worth of its own, service to the community can of course have none. This is sometimes forgotten in modern exhortations to altruism. Perhaps, however, justice is not quite done to the evolutionist formulæ, such as "adaptation." The formula of "increase of life," which Mr. Sorley finds less inadequate than "adaptation" and "complexity," is certainly rather general, and even vague, till it is interpreted; but then so also is the Hegelian formula.

How are we to decide, for example, whether self-realisation shall be in the practical or the æsthetic or the theoretical life? The formula can obviously be applied with equal validity to all three. Is it then rightly described as an ethical formula? Or is it not rather a formula of "the art of life" in general, which includes both ethical and other ends? And in applying it to practical life, how are we to determine what is man's true mode of practical realisation of the self?

The answer given by Mr. Sorley is, of course, that since the individual man is an organic part of society his true self-realisation in conduct must be social. Now it is exactly here that the theory of evolution becomes applicable to ethics. The social application of the Hegelian formula is really determined, not by a dialectical process, but by a more or less complete doctrine of historical evolution. Similarly the hedonism of the utilitarian school was conditioned by a social doctrine, according to which man, if, as critics point out, he is still regarded as an "isolated individual," is at the same time brought into relation with others by sympathy. What the disciples of Mr. Spencer are entitled to claim is that the theory of evolution in its full sense, as he has comprehended it, is capable of giving still more definite guidance to the formulæ, by themselves too vague, of "greatest happiness" or "self-realisation."

"Self-realisation" has, no doubt, one advantage over "happiness" as a statement of the nature of the highest good. It excludes from the sphere of ethics those incidental pleasures that have nothing to do with the attainment of ideal ends. These pleasures, which are the true object of the "hedonical calculus," really belong to an outlying portion of "the art of life." This is what Clifford seems to have in view in the passages referred to by Mr. Sorley in a note on p. 6. Clifford argues that "happiness" (regarded as a sum of pleasures) does not concern ethics except in so far as it makes men better citizens. But, if happiness of the kind referred to has no strictly ethical value, it does not follow that it has none at all. For the rest, Clifford's position is not really inconsistent with the view that happiness of a certain kind is part of the ideal end. This happiness may perhaps be distinguished from isolated pleasures as being the accompaniment of an activity of the whole personality, and not merely of some partial stimulation.

There is, no doubt, an important metaphysical difference between the inclusion of activity or spontaneity among the elements of experience and the "rationalistic" doctrine held by Mr. Sorley, which introduces the notion of end or purpose into

its view of the world as a whole. But does this difference affect the theory in its bearing on ethics? While agreeing with Mr. Sorley as to the close connexion of ethics and metaphysics, we may still find it hard to understand how it can make any difference with respect to the end or highest good of man whether man's end is also the end of the whole movement of things.

The teleology which Mr. Sorley's school regards as the supreme category under which things can be thought, may present itself to another school as a kind of imaginative anticipation of a theory of universal evolution, rather than as the final outcome of a scientific law imperfectly conceived by its discoverers. Even the "external" teleological theories had the merit of pointing out biological facts that needed scientific explanation, and at length found it. Similarly, we may hold, the idea of a universal Reason determining the movements of history was not a mere metaphor, but pointed to an evolutionary law of the phases of human society considered as an organism. In ethics, of course, "teleology" (in one sense) is supreme. An ethical system must bring all knowledge under "the category of teleology" with a view to determining its bearing on the end of man. But when we consider things theoretically, then it is the conception of law that is supreme. We are no longer at the ethical point of view: and to the impartial outlook of the theoretical reason the good of man is no longer anything but a term of a single series among innumerable other series of events in a process of universal change.

THE PHILOSOPHY OF REDEMPTION.¹

PHILIP MAINLÄNDER was a disciple of Schopenhauer, who in a manner at once original and consistent with his master's principles had worked out a doctrine that may be regarded as the completed type of pessimism, when, in 1876, his early death occurred before the appearance, in that year, of his first volume, entitled *The Philosophy of Redemption*. His *Twelve Philosophical Essays*, of which the last was not published till 1886, were intended as a sequel to that work, and the volume which they fill bears the same title. As the two volumes are not only in name but in reality parts of a single work, it seemed desirable to wait for the completion of the *Essays* before any attempt was made to give a survey of the author's philosophical system.

This system, although it is especially deserving of the attention of those who are willing to face a philosophical argument ending with the proposition that "the knowledge that life is worthless is the flower of all human wisdom," is at present quite unknown in England. The best mode of exposition, therefore, will be to give first an outline of Mainländer's whole work, and then of his doctrine, unaccompanied by any criticism except such as is necessary in order to bring out its distinctive character.

Of the volumes that contain all we shall now have of Mainländer's philosophy, the first consists of *The Philosophy of*

¹ *Die Philosophie der Erlösung*. VON PHILIPP MAINLÄNDER. Zweite Auflage. Berlin : Theodor Hoffmann, 1879. Pp. viii., 623.

(*Die Philosophie der Erlösung*. Zweiter Band.) *Zwölf philosophische Essays*. VON PHILIPP MAINLÄNDER. 5 Lieferungen. Frankfurt a. M. : C. Koenitzer, 1882-6. Pp. 655.

Redemption itself together with an Appendix in which the author explains, by detailed criticism, his relation to Kant and Schopenhauer, whom he regards as the two greatest of all philosophers. The division into "Theory of Knowledge," "Physics," "Æsthetics," "Ethics," "Politics" and "Metaphysics" is carried through both parts of this volume. The *Essays* that make up the second volume are arranged under two principal heads—"Realism and Idealism" and "Socialism." In the essays of the first group the relation of the author's system to Brahmanism, Buddhism and Christianity—the three pessimistic religions—is explained. The second group is followed by two essays entitled "Gleanings" and "Critique of Hartmann's Philosophy of the Unconscious." This last essay fills the whole of the fifth published part of the volume. Its aim is to show that Hartmann is in error in returning to a pantheism that makes the whole world "a real unity"; the true direction of thought being to develop further Schopenhauer's doctrine of the *individual* will as thing-in-itself, which requires that the world should be regarded as only "a collective unity," no longer as the manifestation of a single will or spirit.

The later portions of Mainländer's work show no falling off, but on the contrary an increase in power. And, as might be expected, he finds it possible in a series of essays to say many things that could not be got within the more rigid framework of a systematic treatise. Following the *Essays* there was to have appeared an Autobiography; but instead of this there is now promised a memoir of the author, by his sister, who has superintended the publication of the whole of the second volume. Those who have read any portion of his work will look forward with interest to the appearance of the promised *Lebensskizze*, for Mainländer is one of the writers who awaken the desire to know something more of their personality than can be gathered from their books alone.

Prof. Wundt, indeed, in his brief reference to *The Philosophy of Redemption in Mind*, vol. ii. 510, seems to be of opinion that its interest is entirely that of an expression of personality; classing it among pessimistic speculations that

are "guided more by feeling and temperament than by scientific method." This remark perhaps has reference to the absence of any elaborate attempt to balance pleasures and pains or to deduce the pessimistic conclusion from the negative character of pleasure. It may be contended, however, that this is an evidence of the author's profoundly philosophical conception of the question as to the worth of life. While Schopenhauer and Hartmann proceed by indirect methods, deductive or inductive, Mainländer puts the question directly as one that is to be solved by subjective reflection. Having arrived at his own conclusion, he appeals for confirmation to the philosophies of India. What was the result, he asks, when for the first time a philosophically trained class was able to escape from the struggle for existence and to gain complete leisure for contemplation? The result was necessarily the pessimism of the Brahmans. Now this is a powerful historical argument. And if it is said that Mainländer's own pessimistic conclusion depends ultimately not on any argument of this kind but on temperament, it may be replied that any other conclusion depends on temperament in just the same way; that subjective reflection is in the end the only possible criterion of the worth or worthlessness of life. Apart from the view that may be taken of Mainländer's attempted proof of his pessimism, there does not seem to be any ground for the unfavourable inference that might be drawn from Prof. Wundt's incidental remark. The theoretical basis of the system, as a whole, cannot be said to show any want of rigorous logical connexion.

The Philosophy of Redemption opens with the unconciliatory announcement that the author has been the first to establish atheism scientifically. The doctrine that Mainländer calls atheism is a theory of the emanation of the universe from a "pre-mundane unity" that no longer exists. "God is dead, and his death was the life of the world." The atheistic character of this theory, as the author understands it, consists in its not admitting any "real unity" now existent "in the world," but only a "collective unity" of "real individuals." The individual beings that compose the world are

not absolutely independent, but "semi-independent." Their connexion with one another and their being constrained as by an external power proceeds from their having once been parts of the pre-mundane unity. This connexion of things is, as it were, a "divine breath" blowing through the world from the "dead godhead." All things have their origin in what may be called anthropomorphically the "will" of the absolute being that existed before the world to annihilate itself,—an end which could only be attained by the "becoming" of actual existence. From the primitive act of the no longer existing unity springs the total movement or "fate of the world," which makes it as if the collective unity now alone existing were "a simple unity with a single movement" to annihilation.

The real beings that make up the world are "forces," manifesting themselves objectively in motion, subjectively as "individual wills." For Schopenhauer these were manifestations of a "will to live"; and it is true that in the animal kingdom, and still more in man, will has the appearance of being an effort to persist in a specific mode of life. In physics, too, the law of the "conservation of force" (*Erhaltung der Kraft*) is the expression of a will to live. But when we go deeper, the will to live is seen to be always "the phenomenon of the will to die." The more profound law of the "weakening of force" (*Schwächung der Kraft*) is still manifest, not only in molecular movements as viewed directly by physics, but in the cycles of animal and vegetable life. Again, in geology, it is manifest in the gradual dwarfing of all living forms. In the evolution of organisms, however, the will to die becomes more and more masked under the appearance of the will to live. Life, the means, has come to be preferred to death, the end.

Nevertheless, in the struggle of organisms to maintain themselves, the weakening of force becomes more and more rapid, and thus the ultimate end is more effectively promoted. This is seen especially in the history of human civilisation, under its forms of "social friction" and the growth of intellect. "Civilisation kills;" and by its universal diffusion the

weakening of force will be carried to its limit. In philosophical reflection, which begins when civilisation is sufficiently advanced, the "will to die" again becomes conscious of itself. The will of the sage becomes identified with the movement of the whole world towards annihilation. He desires consciously the end to which all beings are impelled by a desire that is deeper than their desire for continued life. To this end, as has been seen, they move the more rapidly the more they seek to avoid it; for the putting forth of activity, by reason of the obstacles that resist it, only brings activity to an end the sooner. Yet it is destined that in all men the will to live shall at length disappear and give place to a full consciousness of the profounder will to die.

For this result, the attainment of an ideal socialistic State is necessary. There are, indeed, a few who can find redemption in any State; but the mass of mankind can only be redeemed in a State where education and leisure and possibilities of enjoyment are the common lot. To see the vanity of all things, they must first have experienced all things. It remains, therefore, in some sense a duty of those who have already discovered the worthlessness of existence to promote social reform, in order to hasten the advent of the ideal State; which, however, will inevitably arrive sooner or later, although the efforts of individuals may promote or retard it. When the ideal State has been attained, the emptiness of existence will fully reveal itself. Only one longing will now fill the heart—"to be struck for ever out of the great book of life," and, since a stationary state is impossible, this desire will be satisfied. The final description of the movement of human history as a whole, is therefore not "movement towards the ideal State," but "movement from being to not-being," and in it the movement of the whole world is consummated.

It will have been observed that much of Mainländer's cosmical system is the translation into subjective and at the same time highly abstract terms of real scientific generalisations. Sometimes he is even more in agreement with accepted science than he thinks. The law of "the weakening of force," for example, is placed by him in opposition to the law of "the

conservation of force," as he supposes it to be understood by physicists. If for this last expression the more accurate expression "conservation of energy" is substituted, the law of the "degradation of energy" at once suggests itself as the physical analogue of Mainländer's "weakening of force." And some physical speculators, assuming, like Mainländer, a finite universe situated in infinite space, have shown how, according to the law of the degradation of energy, all the bodies in the universe must at length collect into a single mass from which all motion will have disappeared.

That such a state of "integration" as this is the absolute end does not, however, of necessity lead to the conclusion that it is a duty to promote this end. An optimist like Mr. Spencer may think it probable that "dissolution" (which comes to the same thing as a final "integration" so far as man is concerned), if not the end of the whole cosmical movement, is the end of each particular cycle; and may hold it a duty to co-operate with the evolutionary movement, in spite of its always being reversed. Yet, so far as the actual course of things is concerned, it is evident that Mainländer has just as good a case as the optimists.

As Mainländer himself sees, the dispute between the optimists and the pessimists must be decided, in the last resort, by a direct consideration of the ends and impulses of human nature. What he holds to be the answer of all the wise, when the question is brought upon this ground, we have already seen. In his own vivid phrase: "Life is hell, and the sweet still night of absolute death is the annihilation of hell." The deepest impulse of man, as of all other beings, is "the will to die," and the highest happiness attainable is in the thought of the cessation of existence. From this he draws the logical consequences. The promotion of social and political reform, although praiseworthy, is not an absolute duty. Those have greater merit who are impelled by pity for humanity to promote directly in others that "transformation and kindling of the will," by the knowledge that "not-being is better than being," which culminates, not in mere indifference to death but in "the love of death." And, finally, the solution of the

problem rests with the individual. The highest virtue, therefore, is absolute chastity; for by it the individual, so far as he is concerned, solves the problem for the race. *The Philosophy of Redemption* does not commend, but neither does it venture to condemn, suicide. It is better, Mainländer says, to remain in life in order to help in the redemption of the rest of the human race; yet the sense of the worthlessness of life, and the longing for the repose of annihilation, may become too great for endurance.¹ All mankind, good and bad alike, are to be consoled by the knowledge that, for the individual, death is a final redemption. The philosopher who has dedicated himself to the service of truth alone cannot avoid the duty of proclaiming this.

Mainländer traces his pessimism not only to the religions and philosophies of India, but also, like Schopenhauer, to Christianity. "Pure knowledge," he says, "is not the contrary but the metamorphosis of faith." On the theoretical side, he connects his own philosophy most closely with Christianity. Brahmanism, because it asserts a unity "*in the world*," seems to him to be most in error. For this pantheistic doctrine makes individual beings, which alone are real,

"I would be at the worst; worst is my port,
My harbour, and my ultimate repose,
The end I would attain, my final good."

Against this, something might after all be said in point of logic for Schopenhauer's position that the end should be expected rather than sought.

"My long sickness
Of health and living now begins to mend,
And nothing brings me all things."

As a contrast to these dramatic expressions of pessimism, it may be interesting to cite an exact anticipation of Spencerian optimism from a not very optimistic poet—

"Ἐλεξε γάρ τις ὡς τὰ χεῖρονα
πλείω βροτοῖσιν ἐσσι τῶν ἀμεινόνων.
ἐγὼ δὲ τοῦτοις ἀντίαν γνώμην ἔχω,
πλείω τὰ χρηστὰ τῶν κακῶν εἶναι βροτοῖς·
εἰ μὴ γάρ ἦν τόδ', οὐκ ἂν ἤμεν ἐν φάει."

Eur. *Supp.* 196-200.

mere instruments of the All. Buddhism is in error too, in that it affirms, by its doctrine of Karma, "the omnipotence of the individual." This doctrine, however, although affirmed in a one-sided manner by Buddhism, is at bottom perfectly true. For each individual being, when it was part of the no longer existing "transcendent sphere" of "simple unity—repose—freedom," willed all that now happens to it in the "immanent sphere" of "multiplicity—motion—necessity." In the reality of things, that is to say, nothing happens to any being in the world that has not been willed by that being. But Christianity expresses the truth that is in Buddhism while not excluding the truth that the pantheism of the Brahmins failed in its attempt to express. In making the individual only "half-independent" it recognises "the destiny of the world," the "real relation" in which things stand to one another. That there is a constraint exercised on the individual will as if by an external power—which appears to the undisciplined mind now beneficent and now terrible—is the truth that is contained in all theism. The error is in attributing this constraint to a personal God existing "*beside* the world." This is the error of Judaism, but not of Christianity. The personal God of Christianity was in reality a concession to Jewish monotheism, as its doctrine of a future life was a concession to the insufficiently tamed Jewish vitality. "Esoteric Christianity" is atheistic; in a veiled form it teaches the doctrine of the self-annihilation of the godhead that existed "*before* the world": and the real reward of the Christian virtues is the "beatitude—felt as contrast through reflection—of not-being." This meaning of Christianity is developed in a remarkable essay on "The Doctrine of the Trinity." As characteristic examples of Mainländer's interpretations of Christian theology, it may be mentioned that in his view "the Holy Ghost is the way of God to not-being," and is identical on the one hand with "the destiny of the world," on the other hand with "the Christian virtues" by which that destiny is accelerated; while "Satan is the personified means to the end," "the wild struggle of individual wills."

Those to whom this seems mere paradox should read the

essay; perhaps they will be rewarded by learning the secret of pessimism. Of one thing there can be no doubt; and that is, Mainländer's really strong sympathy with Christian theology and with the Christian view of life in what some may call its exaggerated, others its distinctive form. It is not to Catholic organisation that he is attracted, but rather to the mysticism and asceticism of the Middle Age, to Catholicism as a personal religion. Mixed with this kind of mediæval reaction there is a larger infusion than is to be met with in the ordinary mystic or ascetic of the "pity for humanity" characteristic of Christianity and Buddhism in their origin. It is this that gives Mainländer his sympathy with the revolutionary movements of modern times. Here, however, he makes a reservation in favour of German patriotism. A "cosmopolitan ideal" such as socialism is not to be pursued in the immediate future. It must be kept in view by those who aim at an ideal state; but in the meantime the first duty of the citizen is to be patriotic.

A rather obvious cause of pessimism is suggested by the passages in which Mainländer, while contending for the necessity of the burdens and restrictions imposed by the State, places them among the serious evils of life. It suggests itself that the pessimism of the Hindus was not really a discovery they made because they had leisure to see the vanity of things, but was due to their want of political freedom. This suggestion would find support in an appeal from India to Greece. Such a merely external cause as political circumstances, however, is not satisfactory as a final explanation. Pessimism must also have its internal cause. What kind of temperament is it, then, to which reflection seems to reveal nothing but "the intrinsic worthlessness of existence"?

It is remarkable that all systematic as distinguished from episodic pessimism, all pessimistic philosophy, is associated with a more or less strong Mediævalism. Some one may object that there is no mediæval reaction in Leopardi. To this the reply is that Leopardi was not a genuine philosophic pessimist. The underlying philosophy of Leopardi is a certain combination of elements derived from ancient thought and culminating in the antique ideals of the individual and the

State. His "pessimism" is really a sceptical despair of the realisation of these ideals; and at intervals (at least in the poems) it almost disappears. A genuine pessimist, besides, does not protest against Nature and Fate, but like the Buddhist and Christian saints (as Mainländer shows) holds himself to be in harmony with the tendencies of the sum of things when by "the slow suicide of asceticism" he seeks the only end that appears to him desirable. Mainländer's "esoteric Christianity" is really what he represents it to be—Christian asceticism made its own reward. He has simply given a well-compacted foundation, of the most modern materials, to what is essentially the mediæval view of life.

To point out its causes is not, of course, to refute Mainländer's pessimism. It may be that the Hindu philosophers and those modern Europeans who are most in sympathy with the Middle Age are those who have most successfully taken into themselves the results of the experience of large and complex societies continued through a long succession of years. What has been said is only intended as an aid to the statement of the question. The conflicting views of life, we now see, are, on the one hand, that for which the dictate of the highest wisdom is to suppress the personality, on the other hand, that for which to maintain the personality is the foundation of all virtue. And what their opponents should seek to establish against the pessimists is—not necessarily that the sum of pleasures in life is greater than the sum of pains; but that life, by moments, has a positive value, and that these are not the moments in which the personality is approaching extinction, but those in which it has the fullest consciousness of maintaining its own being.

PHILOSOPHICAL ANTINOMIES.¹

THE historical view of systems that makes up the larger part of these volumes, itself the outcome of some of M. Renouvier's most original ideas, has enabled him, in his return from history to criticism and construction, to express these ideas with renewed force. Both as a history of philosophy from a clearly defined point of view, and as the latest statement of M. Renouvier's own philosophical position, the whole work is of the highest importance and interest.

The history of thought is viewed not as a series of approximations to a final doctrine which includes all truth in itself, but as a process in which antagonisms become more and more definite; till at length the theses and antitheses of the chief antinomies of philosophy are marked out into two coherent systems, opposed to one another in detail and as wholes. From the beginning of his philosophical studies, M. Renouvier tells us, he was struck with the inward presence of antinomies in the greater philosophical systems. He found that in a small number of systems, as in those of Nicholas of Cusa, Giordano Bruno and Hegel, the attempt was openly made to solve all antinomies by a denial of the applicability of the law of contradiction to real being; and for some time he was under the fascination of this idea, and himself tried to construct a philosophy that should reconcile all doctrines by combining their contradictory positions. With this view he was never able quite to satisfy himself; and at last he

¹ *Esquisse d'une Classification systématique des Doctrines Philosophiques.* Par CH. RENOUVIER. 2 Tomes. Paris: Au Bureau de la Critique Philosophique, 1885, 1886. Pp. 490, 420.

decisively rejected it. The result of this decision was the conviction that from the beginning of philosophic thought truth has been on one side of each of the great philosophic controversies and error on the other, and that the chief philosophical directions remain always the same. There has been progress in accuracy of view of details, in understanding of opposing positions, and in the statement of these positions and their logical grouping; but none of the chief directions has ever succeeded, during a period of philosophical freedom, in excluding the others; and since differences of personality become accentuated instead of disappearing, it is not likely that by free consent at least any of them will ever finally gain the mastery. For it is personality that determines the character of every philosopher's view of the world as a whole. Each view, the true view as much as the false, is a belief, determined partly by the "passive factors" of circumstances and temperament, but ultimately by an act of choice. The great opposing systems which combine in logical order the theses and antitheses of the historical antinomies, and are now in process of being definitely formed, are, on the one side, a pantheism based on the larger hypotheses of science carried beyond scientific limits, and laying claim to the certainty of "evidence"; on the other side a theism based on Kant's postulates of the practical reason, and professing "belief" not "evidence" as its ultimate ground of certainty. To the latter system the author proclaims his own adhesion.

By thus making plain to the reader which side he takes, M. Renouvier has hoped to gain in impartiality, and he has succeeded. A writer who is attracted by strong and decided affirmations and negations, and who sees in the history of philosophy the tendency of systems to become more individualised rather than the tendency to compromise and conciliation, is, besides, under no temptation to tone down his opponents' views, and can do justice to them without finding in them resemblances to his own. M. Renouvier's treatment of views opposed to his own is frequently even more than impartial. The intellectual sympathy which he displays with the pantheistic ideas of the early philosophers

of Greece does not disappear when he comes to deal with modern philosophers; but what has struck him especially is the far-reaching character of the ideas thrown out at the opening of each period of speculation, and in times of revolutionary change of thought. We are wrong, he remarks, in thinking the height of abstraction reserved for an advanced and complex state of intellectual culture. Except in morals, the true initiators, and often the most profound, in that their views were more exclusive and more absolute, were the philosophers of the first period of Greek thought. And in this period, as M. Renouvier fully admits, the predominating speculative tendency was pantheistic.

The pantheistic doctrine which was predominant in the earliest Greek speculations, which has found its most rigorous expression in Spinoza, and which is equally the doctrine of Hegel and of the contemporary philosophy that claims to be based on physical science, is, when quite consistently developed, a doctrine of the Thing or permanent substance of which all personality is a passing mode, as opposed to the Idea or phenomenon which has no reality except as part of a consciousness; of the Infinite as opposed to the Finite; of Evolution as opposed to Creation; of Necessity as opposed to Liberty; of Happiness as opposed to Duty; and of Evidence as opposed to Belief. This sixth antimony was the last to receive clear expression. Till Kant, with hardly any exception, the only positions as to the criterion of certitude were those of "evidence" and "scepticism." This last doctrine left the practical choice to be determined, not, as it must be according to the true doctrine of belief, by reasons which although not purely intellectual are valid for all men, but by custom and authority. According to the temperament of the sceptic the attitude finally assumed may be—to take typical examples—either that of Montaigne or of Pascal. Once the doctrine of a belief determined by active as well as passive factors of the personality and finally not on intellectual but on moral grounds,—in its distinction equally from sceptical suspension of judgment and from a supposed "evidence" or "vision" that gives assent in spite of the

will,—has been clearly disengaged, all the other theses and antitheses are seen to depend on the position taken up with regard to this antinomy. Hitherto they have always, even in the most rigorous systems, been combined with more or less inconsequence. Till quite recent times Idealism, for example, had not received accurate expression; there always remained a mixture of realism, of the doctrine of the Thing or “subject” as it is in itself apart from consciousness. And the progress to true idealism has been accomplished chiefly by means of the works of the modern empirical school, more favourable to the intellectualist doctrine than to the doctrine of belief, and by mediæval Nominalism, the scholastic form of empiricism. Again, the doctrine of “the realised infinite” has always formed part of Christian theology, having got there by a confusion of the idea of infinity in the sense of moral perfection with the infinite of quantity in space and time. Yet logically this leads to the pantheistic doctrine of the infinite and eternal substance, and to the denial of an absolute beginning of action, that is, of real creation and of free-will. By another inconsequence, the ethical doctrine of the Stoics and of Spinoza was a doctrine of Duty, an “ethics of Reason,” essentially identical with the Kantian ethics, and not a doctrine of happiness such as ought to have followed from their system of pantheistic evolution. The definite statement of the antinomy of “intellectualism” and of the “practical reason” removes these and other inconsequences, and makes the constituent propositions of the two systems arrange themselves at last in perfectly logical order.

Regarded metaphysically, M. Renouvier’s doctrine is a phenomenism like that of Mr. Shadworth Hodgson. The difference between the two doctrines consists chiefly in this, that Mr. Hodgson follows more the tradition of the English experiential school, M. Renouvier that of the school of Continental rationalism. At the same time Hume, as represented by the *Treatise*, has had an influence on M. Renouvier comparable to the influence of Kant on Mr. Hodgson. In their practical outcome the two doctrines are not unlike, both philosophers having accepted from Kant the distinction of

the "practical" and the "speculative" reason. Neglecting minor differences, then, let us ask: What is phenomenism as distinguished from other doctrines that also claim to be idealistic?

According to M. Renouvier, the ancient idealistic doctrines, such as that of Pythagoras, which tried to account for experience by the limiting mind, as opposed to unlimited matter, which was in various forms the principle of the Ionians, failed for this reason, that they took one particular formal element in mind and "hypostasised" it. "Number," the principle of the Pythagoreans, although a formal mental principle, became, when viewed in isolation, a "thing," just as much as the atom of Democritus, the most purely material of all the "physical" principles. On the other hand, the atom, although regarded from the first as an element in things, was not a datum of sense, but the result of an abstraction, and thus had a sort of mental character of its own. The two conceptions, therefore, opposite as they seem, differed little in effect. And instead of giving their ultimate explanation of things in terms of personality, the Pythagoreans, and the idealist schools of antiquity generally, fell back into a system of pantheism. With the Pythagoreans, for example, all phenomena became parts of a "mathematical evolution of the multiple and the one." In modern times the doctrine of Hegel—described by M. Renouvier as "a Platonism with Eleatic basis, joined to an attempt to trace the history of the Idea confounded with the history of the world of phenomena"—illustrates the same tendency. The "thought" of Hegel is an element in mind hypostasised; and, when the bias of the orthodox disciples of Hegel is got rid of, thought becomes a "thing" figured as evolving itself necessarily and as having personality for a mere temporary phase. Hegelianism thus comes not to differ intrinsically from a materialistic doctrine of evolution.

From these criticisms of other forms of idealism, it appears that what distinguishes the phenomenist doctrine is the refusal to regard any one element in mind, however capable of distinction by analysis, as having a real existence by itself apart from the rest. That is, the distinguishing feature of pheno-

menism is its principle of "the relativity of representations" to one another. It pushes this principle to the extent of affirming that, since actually every phenomenon appears under the form of personality, there can be no ultimate philosophical explanation of things otherwise than in terms of personality. A doctrine such as that of Lotze and his disciples, which makes personality ultimate in its explanation of things, and is idealistic as regards the external world, would nevertheless be rejected by a phenomenist because it retains "the substance of mind"; its monads being miniatures of the individual mind hypostasised. The doctrine that speaks of "elementary feelings" as things-in-themselves does not, like monadism, assume a substance of mind under the name of "the soul"; but from the phenomenist point of view it is realistic as the Hegelian doctrine of "thought" is realistic, because it hypostasises the material element in mind as Hegelianism hypostasises the formal element; and of course it does not place personality at the beginning of things.

Except on one point, M. Renouvier concedes that the pantheistic system, although incapable of demonstration, is theoretically impregnable. The one point where it can be assailed on grounds of pure logic is its assertion of a real infinite of quantity, which follows from "the doctrine of the thing" as opposed to "the doctrine of consciousness." "The actual infinite number" required by the existence of an infinity of distinguishable phenomena in space or time is self-contradictory. The law of contradiction, however, in its application to realities, has been denied by consistent partisans of the infinite; and to assert it as universally true is, like any other proposition of the kind, an act of belief. Even in this case, therefore, it is in the end moral considerations that must determine the choice of the thesis or the antithesis. From the point of view of the doctrine of consciousness there can be no question of any actual existence that is other than finite. This truth was expressed by the Pythagoreans in their theory of the limit; but they in part destroyed its effect by retaining "the unlimited" as a kind of matter upon which form is imposed. The doctrine of the infinite and absolute,

as it has asserted itself in Christian theology, is, however, a falling-off from what we may regard as the typical Greek conception of reality as belonging to a limited, ordered universe, and of the unlimited as essentially unreal. The "realised infinite," M. Renouvier shows, has no place in mathematics. And it is there, if anywhere, that we should expect to find it; since mathematicians use a terminology that seems to imply infinities of all orders. The notion of a real infinity, however, is not only not employed by mathematicians; it is no more required for the philosophical explanation of any mathematical or other scientific conception. Everything that can be expressed in terms of consciousness, that is, everything that can be thought as real, is finite. Consciousness itself, personality, is essentially finite. The "doctrine of consciousness" requires that phenomena should have a beginning, but not necessarily that they should have an end; for the absence of a beginning implies a past eternity filled with events, that is, a "completed infinite"; but future eternity is supposed never to be completed; the series of phenomena, even if it should never have an end, will always be capable of expression by a finite number. Phenomena have had their beginning in a personality, which, like other personalities, is necessarily finite. The universality of law—the resemblance of the order of phenomena in different persons—requires that there should be one supreme Deity: M. Renouvier now regards this argument as conclusive against the possibility he had formerly left open for polytheism. The Deity must be held to be limited in knowledge by "the real contingency of futures." For, corresponding to creation in the universe as a whole, there is a real beginning of a new series of phenomena, a cause that is not also an effect, in certain decisions of the human will. Thus the doctrines of the finite, of creation and of indeterminism form a connected group opposed to the doctrines of the infinite, of evolution and of the absolute determination of all phenomena as parts of an eternal series; and these groups of doctrines attach themselves on the one side to "the doctrine of consciousness," on the other side to "the doctrine of the thing."

By "evolution" M. Renouvier understands here "philosophical" as distinguished from "scientific" evolution. The special evolution-theories of the sciences, like other special scientific theories, cannot logically, he holds, be extended under the name of "science" to the whole order of the world. "Science," when it is anything more than a collective name for "the sciences," means one of the two opposing philosophies; and this philosophy has no right to claim for itself, as it does by assuming the name of "science," the certainty that each of the special sciences has within its own limits. Of the philosophical doctrine of evolution there are two forms—the "statical" and the "dynamical." Spinoza's doctrine of modes is a real evolution-theory of the first kind, although it makes no attempt to express in a single formula the law of the series, which it assumes, of absolutely determined and eternally changing phenomena. Theories that are evolutionist in the more special "dynamical" sense, such as that of Leibniz—which was the first to combine the ideas of physical evolution and of progress—introduce the conception of an end towards which the evolution of the world is the necessary movement. They are less consequent than Spinozism; since they have to borrow the idea of end from the doctrine of consciousness.

Immediately connected with the antinomy of necessity and liberty is that of happiness and duty. No doctrine of necessity, M. Renouvier contends, is consistent with a morality that makes the correlative conceptions of "duty" and "right" fundamental. For there can be no "obligation" to do that which, by the mere fact of its not being done, is shown, according to the doctrine of necessity, to have been impossible. Determinism reduces all moral questions to questions of selecting the right means for attaining ends fixed by personal taste. The end is not necessarily egoistic; but if happiness is the only conceivable end, man has, so to speak, "the right to egoism." The sentiment of altruism can only be appealed to so far as it exists; and it can never acquire the character of an imperative. Eudæmonists, therefore, for the most part, aim at producing by education artificial associations of ideas

of the good of society with ideas of personal good. This supposes control of public opinion and of the machinery of education by those in whom the idea of good happens to have taken the altruistic form; and this control must be exercised with a view to forming all minds according to a single type. The endæmonist morality of "benevolence" or "sentiment" thus lends itself naturally to theories of political and social despotism. And that the putting of some "good," however elevated, in place of the conceptions of duty and right, has actually had such theories for its consequence, is seen in the history of speculations that make the idea of good supreme, from Plato's Republic to the political system of Comte. J. S. Mill perceived this tendency of "benevolent utilitarianism" and tried to avoid it, but without success, so far as he argues from his own theoretical point of view. He perceived also the unsatisfactoriness of a morality that depends on artificial associations dissoluble by analysis. In Mr. Spencer's ethical doctrine there is a falling back on the idea of an inevitable progress of the human race, as the means of bringing about a spontaneity of benevolent sentiment; but in the meantime there is no foundation for really ethical "injunction." As in other utilitarian systems, when there is no question of enforced obedience to external standards all depends ultimately on personal taste. It is the same with the morality of pessimism. Schopenhauer, for example, who makes "pity" take the place of the "sympathy" of optimistic utilitarianism, entirely rejects the idea of duty. Essentially, contemporary optimism and pessimism are at one as to the ethical standard. The opposite ethical doctrine is to be found in the Stoics and Spinoza; but it received for the first time perfectly accurate expression in Kant's *Practical Reason*. The idea of duty is implicit in Stoicism as "conformity to the order of the universe"; that of liberty as "independence of external things." On the one side, however, there is as yet no true idea of obligation, and on the other side there is theoretical determinism. So far as Kant retains the idea of absolute determinism in the phenomenal world there is an inconsequence in his system also;

but in his ethical formula, the categorical imperative, he has corrected both the principal defects of Stoicism. Kant's great achievement was to make ethics independent of every system of metaphysics. In consequence of this he was able to found his metaphysical doctrine on his ethics, substituting practical "postulates" for theoretical "dogmas." The relative positions of practice and speculation are thus reversed. There is no longer any apparent dependence of morality on cosmical physics and the law of evolution of the world; "conformity to nature" has become explicitly what it always really meant, conformity to the nature of reason. Duty has been rigorously defined, and the doctrine of happiness placed in its true dependence on the morality of duty.

For a doctrine of happiness is after all necessary. The question of optimism and pessimism is not indifferent to philosophy, but is a question which, once it has been raised, requires a decisive answer. Now the Kantian doctrine enables us to view happiness as dependent on our own attitude towards the world, not on a previous determination of the nature of the world. There are two beliefs that it is theoretically possible to hold: the belief that duty and happiness are in the end brought into harmony; and the belief that the idea of justice has no application in the universe as a whole. We are under the moral obligation to choose that belief which will enable us to act best. This position is fundamentally that of Pascal's "argument of the wager." The necessity of acting renders it impossible to refrain from choosing; and we must choose the alternative on the side of which our highest interests are placed. There is this defect in Pascal's argument—that one particular doctrine, the doctrine of the Catholic Church, is arbitrarily taken as the subject of the wager. An opponent can object against Pascal the merely local and temporary character of this doctrine; and then there is the scientific test of historical evidence. The argument of Pascal, however, can be thrown into a universally valid form. It has been "reduced to good sense" by Locke, and cleared of even the appearance of making an appeal to "the lower interests" by Rousseau. The principle of its reduction to a valid form

is that we must seek "the maximum of security in the minimum of determination of doctrine." Kant's postulates of the practical reason—God, Freedom and Immortality—are found to be at once necessary and sufficient. Freedom is required in order to make moral obligation possible; immortality—or at least continuation of life after death—to make possible the realisation of the ideal of justice in the universe; theism, inferred, as we have already seen, from the necessity of a creative act and the universality of law, is required as a security for the final ordering of the universe in accordance with the principle of justice. A necessary part of the system of the postulates is that physical evil should be traced to moral evil. This is made conceivable by the doctrine of free-will as "a gift" which could not be conferred without the power being left to the creature to choose wrong as well as right. By the existence of a real free-will the sense of sin and its reality are also explained.

We come at last to the antinomy of evidence and belief, on which, according to M. Renouvier, everything else depends. Real indetermination of actions, he maintains, requires real indetermination of judgments. This doctrine of the indetermination of judgments is traced to Rousseau. Rousseau's ethical doctrine, although superficially it looks like a "doctrine of sentiment," is really, M. Renouvier contends, a "doctrine of the practical reason." The admiration of Kant for Rousseau is well known; and M. Renouvier traces Kant's optimism—in viewing the history of the world as determined in accordance with the postulates—to Rousseau, as he finds in Voltaire the literary inspiration of Schopenhauer's pessimism. That belief—the free choice of a judgment as to the ultimate nature of things—is something more profound than "evidence," must be the view of those who hold to the doctrine of consciousness. To affirm the existence of other personalities and of the uniformity of nature is to go beyond what is given in the actual phenomena. We are not, indeed, without motives for believing; there is evidence that suggests belief; but there is also an active factor. The mind in part creates the truth to which it gives its assent, as it is creative in volition. Those,

on the other hand, who decide for the pantheistic system of the eternal evolution of an infinite substance, always hold in some way, even when, like Mr. Spencer, they speak of ultimate "beliefs," that they are asserting a truth forced on the mind from without, or given in a sort of intellectual "vision," a truth of which denial is impossible. But to any one who speaks of universal beliefs, of propositions the negation of which is inconceivable, the history of philosophy is a sufficient reply. There is no proposition, not even the law of contradiction, of which the application to real being has not been denied by some philosopher. The appeal to "evidence" is therefore only a statement of the belief of a particular person that he possesses a certain kind of insight which, it must be supposed, he has by necessity, while others are necessarily in error.

Since M. Renouvier makes everything depend on his doctrine of belief, we must examine this doctrine closely before proceeding to criticise any other part of his system. The choice of an ultimate belief, in M. Renouvier's view, is an act of free-will; but he does not represent the doctrine of belief as absolutely bound up with indeterminism. Indeed he shows, in more than one passage, how a determinist may recognise the active factor in judging. Indeterminism being excluded, there seems to be no reason why an opponent on ultimate philosophical questions should not admit the essential part of M. Renouvier's contention, *viz.*, that there is a personal element in all systems of metaphysics; that in this element there are active as well as passive factors of belief; and that whenever we go beyond the mere present phenomenon there is a "wish to believe" one proposition rather than another, determined either by intellectual or practical interests. All beliefs are of course subject to the tests of verification and of consistency. Beliefs that cannot bear these tests must disappear sooner or later, whether we wish it or not. M. Renouvier does not deny this; but to any one who should insist that for these reasons "evidence" is more profound than "belief," he would reply that there is more in the great philosophical systems than can be completely submitted to either test. The pantheistic doctrine

which is the final outcome of the set of positions opposed to his own is, he admits, as consistent with itself as the doctrine of the practical reason. To the positivist or agnostic objection that there is no need to choose between opposing systems of metaphysics at all, he replies that not to choose would be to take custom instead of reason for the guide of life; but that those who use this argument have really made their choice, and that they imagine themselves to have "evidence" sufficient for the refutation of the view they practically reject.

To the belief at which M. Renouvier arrives on the ground of the Kantian postulates, it may be objected, from the practical point of view, that the construction is too "problematical" to have any real influence on conduct. The objection he himself makes to Pascal's argument might also be brought against it. This type of theism, it might be said, is after all only the ghost of a particular historical religion, not really, as is contended, "*quod semper, quod ubique, quod ab omnibus*." Its special affinities are seen by M. Renouvier's regarding as possible an alliance between "the Criticist philosophy of consciousness" and a Christianity cleared of the dogmas of "absolutist" and "infinitist" theologians. A religious creed going beyond the "necessary and sufficient" postulates of the practical reason, he allows to be legitimate in its own sphere. Although it may not be confounded with philosophy, it may be held as a kind of "philosophic faith." But—not to pursue these considerations of detail—there is a fundamental objection to the whole method of "the practical reason."

M. Renouvier, it must be remembered, contends for an element of active desire in the affirmations of *both* the great philosophic parties. In the case of the party opposed to his own, he often speaks of this desire as having its motive in intellectual as distinguished from practical interests. Yet, rather strangely, he never definitely asks whether the desire that expresses itself here may not be that by which exclusively we ought to be influenced in the decision of the last questions of metaphysics as of the first questions suggested by scientific

curiosity. He never seems to conceive it to be possible that any one who has seen that there is active choice of belief should still maintain the primacy in metaphysics of the theoretical reason; should regard the introduction of ethical considerations at the point where the highest speculative questions are reached as being just as irrelevant as it would be in physical science. The exact omission that is made is seen most clearly in M. Renouvier's view of Spinoza. An "inconsequence" is detected in Spinoza's passage from his pantheistic metaphysics to an ethical doctrine of an elevated kind. The moral emotion that finds expression in the ethics, it is implied, ought not to have been excluded from the determination of the metaphysical doctrine; since it has been excluded, however, its coming in afterwards is unjustifiable. But, according to M. Renouvier's view, Spinoza's theoretical doctrine must have been in part emotionally and actively determined; for no doctrine escapes this necessity. If it was not determined by an ethical emotion, by what kind of emotion, then, was it determined? Clearly an incomplete enumeration has been made of the elements of Spinoza's philosophy. Account has been taken of the high moral emotion as well as of the passionless analysis; what has been omitted is the "*amor intellectualis*"—the desire for perfect completeness of explanation by purely theoretical and "immanent" principles. But is not this the properly philosophical emotion? And does not its dominance in what M. Renouvier calls the "*intellectualist*" systems furnish a presumption that these, and not the "*practical*" systems, have given the right answers to the perennial questions of philosophy? The emotion directed to practice has its scope in the discrimination of right and wrong actions or dispositions. The philosophical emotion is an impulse towards what M. Renouvier himself calls "*the ideal of science.*" Can any reason be given why, when we are approaching this ideal, we should be turned back from it by views of practical utility? It is not as if there were no positive impulse conflicting with affirmations made in the name of the practical reason. If this were so, we should have remained

for ever absolutely under the dominion of practical considerations; the idea of a disinterested view of the universe would never have occurred to us. But, when this idea has once presented itself, has not "the practical reason" the appearance of being in intellectual things something of an interloper?

Of course philosophy, if it is to be worthy of the name, must somewhere make a return on practice, so as not to abandon life to the guidance of custom and unreasoned opinion. But M. Renouvier shows that it was exactly in antiquity, when the primacy of the theoretical reason was unquestioned, that philosophy applied itself most to practice and had most practical influence. After remarking on the comparative weakness of modern philosophy, beginning with Descartes, on the practical side—the *Ethics* of Spinoza being mentioned as an exception—he explains the "intellectualism" (in this sense) of modern philosophy by the circumstance that the practical field was preoccupied, and that for a long time philosophers were warned off from it. The doctrine of "the practical reason," however, seems to be anything rather than the correction of this kind of intellectualism in modern philosophy. If philosophy, instead of moving away from practice and viewing life impartially in order to return afterwards more effectively to its practical regulation, is to keep practical considerations in view in its metaphysical constructions, of two indemonstrable assumptions to take not the one that fits in best with the ideal already suggested by science, but the one that seems most likely to encourage action, this means that action, just as with the Pyrrhonists, will fall under the dominion of custom. For practical considerations introduced not merely as a stimulus but as a guide, prior to the final theoretical construction, can only be considerations depending on those unanalysed aims of which it is a function of philosophy to ascertain the comparative value; considerations, therefore, which from the first invalidate the critical function of philosophy with regard to practice.

This is the effect that a doctrine of the practical reason would seem likely to produce. Yet it must be acknowledged that there is no trace of this kind of effect on M. Renouvier's

own practical philosophy. He applies an equally severe analysis to all the phrases that have been proposed as solutions of the problems of the ethical end and of the worth of life; keeping always in view the essential question of the aim of the individual. In the case of so consistent a thinker as M. Renouvier, it would be absurd to say that this is in spite of his theory, not because of it. We must try to find an element of truth in the doctrine of the practical reason that may be recognised by those who cannot in any sense accept that doctrine as a whole.

M. Renouvier, as has been seen, claims for Kant the merit of having been the first to make explicit the independence of the ethical end on particular systems of metaphysics. This truth is already present, he admits, so far as its effective application to conduct is concerned, in the "independence" of the Stoics, and in Spinoza's doctrine of freedom as action from within; but this "independence" or "freedom" is represented at the same time as a harmony with external nature, or even sometimes as "obedience" to nature, and is not defined strictly in terms of personality. M. Renouvier's analysis certainly enables us to understand better the fascination which Kant's formula has exercised. The truth of "the autonomy of ethics," we may be disposed to think, is expressed most clearly by M. Renouvier when he states it without reference to "the practical reason"; but that it should appear as if bound up with the Kantian doctrine is explicable. As soon as it is seen that ethics, although dependent for its working out on theoretical knowledge, is independent of any theory of the universe so far as the determination of its essential end is concerned, the preconceived idea of a subordination instead of a co-ordination between metaphysics and ethics takes effect in a simple reversal of their previous order. The doctrine of the practical reason, therefore, may be regarded as an exaggeration of the truth of "the independence of ethics."

The process that has just been described is aided by a certain incompatibility, not intellectual but emotional, of the theoretical and the ethical view of things. The ethical view of external nature must always be somewhat Manichæan. M.

Renouvier has illustrated this by quotation of the celebrated passages from Mill's *Essay on Nature*. Those, on the other hand, who take by preference the pantheistic or intellectualist view, tend to pass from admiring contemplation of the order of the universe to assertion of its ethical perfection. This tendency is found, often unaccompanied by pantheism, in men of science. M. Renouvier contrasts, for example, Darwin's admiration of the law of survival of the fittest, regarded hypothetically as imposed by a creator, with Mill's reprobation of laws of conflict and mutual destruction among living beings. And more than once he shows the ethical superiority of Spinoza's system—attained, as he thinks, by the inconsequence of practically detaching ethics from metaphysics, when, according to Spinoza's principles, ethics should be subordinate—over the optimistic doctrines of Leibniz and Hegel. This last comparison may furnish a suggestion for solving the difficulty. Is not the remedy to distinguish clearly the ethical from the theoretical point of view, neither subordinating nor suppressing either; to avoid, on the one hand, affirming an ethical end of the universe, and on the other hand to refrain from all attempts to find a moral justification of anything in the mere fact of its necessary determination according to universal laws? The refusal to compromise between points of view, each maintained as separately valid, is not really an inconsequence.

A distinction of points of view may help to clear up the antinomy of happiness and duty. We may admit that the conceptions of obligation, of duty and of right are not ultimate in ethics, without denying them all relative validity; without declaring them to be mere illusions, and proposing to substitute direct seeking of the good of others under the impulse of sympathy or pity for the idea of justice as foundation of the social order. There is no doubt that the systematic working out of some doctrines of "happiness," or of a "good" as the ethical end, has led to the theoretical suppression of personal freedom. This, however, is due to the special character of the good that is aimed at; in these cases some social good is regarded as superior to the good of all individuals. Those who recog-

nise, with M. Renouvier, that the highest good, while attained socially, must be a good for the individual, and that personal freedom is a condition of its attainment, are entirely at one with him practically, although they may make rights and duties deductions from the conception of good, not ultimate conceptions. To the making of obligation ultimate it may be objected that the word "obligation" implies command from some source; and that a command, as M. Renouvier fully recognises, cannot be the ultimate reason in ethics. The empirical doctrines that trace ethical precepts to commands, of which he acknowledges the merit as attempts to account for obligation on egoistic grounds, justify the commands finally as means to a good that can only be attained by social action according to definite rules. But to these doctrines, and equally to those that make more use of sympathy, it is objected that everything depends on the individual taste and disposition. Suppose that any one is not sufficiently sympathetic; or that, having recognised that the existence of the social order and (as part of it) his own action in accordance with justice, is on the whole to his personal advantage, he should nevertheless decide to evade the requirements of justice and gain a greater advantage, whenever he can escape detection: how is the moralist to convince him that he ought to act rightly? To this it can only be replied that voluntary acceptance of an ethical code does after all depend on the empirical fact of the social nature of man; and the degree in which men act according to the principles they accept, on the degree in which certain dispositions are present. The admission of this, with all its consequences, no doubt supposes a different conception of personal merit from that of Kant. On the whole, however, M. Renouvier's ethical antinomy, although some irreducible differences are left, does not seem to be quite so absolute as he contends.

Of the remaining antinomies there is at least one—that of finite and infinite—where those who are in general agreement with M. Renouvier would select the antithesis. The opposition of evolution and creation, which, when they are considered as philosophical doctrines, seems at first irreducible, can be

solved by an evolutionist without absolute denial of creation. For creation, in the sense in which M. Renouvier attributes it to the human mind (with exclusion of indeterminism) may be perfectly well regarded as the outcome of a universal process of evolution. This explanation goes naturally with the admission in a certain sense of M. Renouvier's doctrine of belief. He himself is the first to admit that as regards the antinomy of "Thing" and "Idea" that heads the series, all schools of philosophy are now in a sense idealist, as at the beginning all were in a sense realist. To the contemporary "school of the ideal," represented in different ways by M. Vacherot and M. Fouillée, he takes up an attitude of opposition, on the ground that it denies in effect the existence of the ideal outside the human mind; yet he has affinities with that school. There is much resemblance, for example, between his view of the infinite and M. Vacherot's, although their affirmations about the reality of the infinite are quite opposed. Both philosophers bring out with great distinctness the opposition of the idea of perfection, which, as they see, must be that of the highest degree of definite order and clear consciousness, and therefore essentially finite, to the idea of unlimited extension or force, the *ἀπειρον* of Greek philosophy, chaos as opposed to cosmos. Again, M. Renouvier's re-statement of Pascal's "argument of the wager" has something in common with M. Fouillée's doctrine of "risk" in action and speculation. It is true he does not end with doubt but with belief; yet belief, in distinction from knowledge, implies at least the possibility of doubt.

But although two types of thought may not be quite so clearly marked out as they ought to be according to the theory embodied in M. Renouvier's classification, it is only with the aid of a classification such as this that an adequate account can be given of the whole movement of philosophy. The idea of a perennial opposition of philosophic doctrines, and of increasing distinctions among them, is not that which historians of philosophy like best to dwell on; but now that it has been not merely stated and defended but made the central idea of a systematic classification, it ought to be recognised as

at least as important an aspect of the truth as the more common idea of philosophic progress. And M. Renouvier does not, by a movement of reaction, deny the portion of truth that is in the conception of progress as continuous and in the same direction. He recognises the limitations it imposes on his own view, as well as those that are due to what he considers illogical mixtures of doctrines. One ground that a critic might take here is to contend that these mixtures are not all illogical, and that the divergence is really towards several types instead of only two. This would be a criticism in the sense of M. Renouvier's own doctrine. But whatever may be the view taken of the outcome of the classification, there cannot be any difference of opinion as to the value of M. Renouvier's work in detail. Every page of it is full of instruction. To its merits as history this is to be added, that it will compel readers who may have arrived at any fragmentary philosophic view of their own to consider carefully the bearings of this view with regard to the whole, and the direction in which it ought to be developed if they wish to be consistent.

It will be remembered that M. Renouvier finds one logical defect in the system of pantheism to which, as he holds, modern "scientific philosophy" is tending. From the contradiction that is said to be implied in the assertion of infinity, Mr. Shadworth Hodgson, in the first of his two articles on M. Renouvier's philosophy in *Mind*, vol. vi., has pointed out a way of escape. "The realised infinite," Mr. Hodgson admits, is a contradiction; but the contradiction comes from taking "representation" as coextensive with phenomena, and assuming categories that are "forms of thought, not perception." "If we take the forms of perception, time and spatial extension, as our ultimates, then we shall find that infinity is involved in all perception. Every perceived thing, which is a portion of time or of space, has time or space beyond it. The perception that this happens always, wherever you have a perception, *this* is the infinity of time and space" (*Mind*, vi. 56). It is remarkable that this restoration of an "unexplored remainder," as the necessary background of all knowledge, is

not made in the interests of a pantheistic view, it serves to rescue pantheism, as formulated by M. Renouvier, from the contradiction he finds in it. M. Renouvier, however, according to Mr. Hodgson, is right in everything but neglecting the background of knowledge, of which the necessary existence is revealed only in perception. The infinite, in Mr. Hodgson's sense, has no place in mathematical or any other science, but forms the inevitable background of all definite knowledge; practically, the infinite, when dealt with by thought, becomes what M. Renouvier wishes to substitute for it in all cases—an indefinite possibility. The section in which M. Renouvier discusses the antinomy of infinite and finite is, it may be added, one of the most valuable parts of his book. The real matter in dispute is disentangled from the complications of scientific hypotheses, and is shown to be a rational question, which, if it is to be solved at all, will not be solved by the mere "progress of science" independently of philosophic reflection. It is above all in making clear the true character of questions of philosophic criticism such as this, their fundamental position with regard to the sciences, their persistence throughout all stages of scientific development, and their insolubility except by criticism applied directly to consciousness, that the merit and distinction of M. Renouvier's method consists. Whether we are able to accept his solution of any particular philosophic problem or not, his statement of it may always be taken to be, as far as it goes, perfectly logical, and an indispensable basis for further study.¹

¹ See Correspondence printed in the Appendix.

GIORDANO BRUNO AND HIS TIME.¹

EVEN more now than when it was first published, forty years since, Prof. Carrière's classical work on the philosophical ideas of the Renaissance or "Reformation-time" appeals to the need that is felt for the kind of renewal which he has himself described, by a phrase adapted from Machiavelli, as a "bringing back of philosophy towards its origin." Along with the increasing specialisation of the present century there has been a rising desire, as Prof. Carrière shows, to attain again that largeness of outlook which has characterised the beginning of each intellectual epoch and which specialisation by itself tends to destroy. The philosophical ideas that within the properly modern period have been developed in different and sometimes conflicting directions, are all present, he contends, "in germinal totality," in the philosophy of the transitional period from the middle of the fifteenth to the middle of the seventeenth century. In Giordano Bruno, the supreme philosophical expression of that period, we may rediscover a view of the world as a whole which was lost in the dispersion of thought during the seventeenth and eighteenth centuries, but which could not have been fully understood till the various elements combined in its original unity had been worked out in their separateness. The systems of Spinoza, of Leibniz and of Hegel are all developments of that which is contained implicitly in Bruno. With the theory of things that Bruno attained by poetic vision, but left to others to develop dialectically, the mystical doctrine of Jacob Böhme—who represents

¹ *Die philosophische Weltanschauung der Reformationszeit in ihren Beziehungen zur Gegenwart.* Von MORIZ CARRIÈRE. Zweite vermehrte Auflage. 2 Theile. Leipzig: F. A. Brockhaus, 1887. Pp. xi., 419; vii., 319.

the freer spirit of the German Reformation as Bruno sums up the Italian Renaissance on its philosophical side—is in essential agreement.

It is not necessary to go as far as Prof. Carrière in seeking at the opening of the history of modern philosophy an anticipation of a final doctrine, in order to recognise the justification of his point of view. Whether Bruno's writings in particular have had any positive influence or not, they have undoubtedly the character that is claimed for them of anticipating many theories of later science and philosophy. And Bruno is most important in relation to the present where he is the representative of the most daring aspirations of his age. Penetrated, as Prof. Carrière says, with the spirit of the classical writers and thinkers, he sought to form out of the fragments of ancient thought and the beginnings of modern science a system opposed at all points to Scholasticism or philosophy within the limits of faith. He represents at once the "return to nature," that is, to the direct vision of things apart from all external authority, the rejection of the "*consuetudo credendi*"—"impedimentum maximum cognitionis," as he calls it—and the "return to antiquity," that is, to the study of what had already been achieved by free speculation and free artistic impulse. Now this intellectual and spiritual detachment from the Middle Age, in spite of the progress that has since been made in the practical sphere and in every field of science, has in some respects never been so complete as it was during the Renaissance. What was at first gained by the insight of the few has had to affirm itself in its application to details of life and thought and to diffuse itself by degrees downwards from the sphere of higher speculation. During this process the "*consuetudo credendi*" has reaffirmed itself in innumerable reactions, and has often made the systems even of great philosophers other than they would have been had they been determined simply by free speculative activity. If then we are to make a new effort at speculative construction, the philosophers of the Renaissance may be of more importance to us than some later and more celebrated thinkers. It is true that a more exact knowledge of ancient thought, the

principal material of the men of the Renaissance, has since become possible ; but this does not by any means destroy the interest of Renaissance speculation. Ideas derived from ancient philosophy were not merely reaffirmed, but gained at once in generality and concentration through the necessity of opposing them to the concentrated and generalised positions of an authoritative system of received doctrine. Thus it is that in the period of transition before the real beginning of modern philosophy with Descartes, we see better than at any later period what is the permanent character and tendency of the higher speculation of modern times. A new way of thinking as regards the whole is already clearly defined against the mediæval way of thinking ; and the influence of the resisting intellectual medium in which the modern spirit is to move has not yet been felt in its full complexity.

Some readers will find in Prof. Carrière himself, so far as he aims at a new philosophical synthesis, a certain falling-off from the Italian philosopher for whom he expresses most admiration. Whether we call it a falling-off or an advance, it is certain that he is not so nearly at one with Bruno in his answers to the highest questions as he thinks. To this we shall have to return ; but first an attempt must be made to give to English readers some idea of the distinctive features of Prof. Carrière's book as a history of the whole period of intellectual transition from the Middle Age. What is especially worthy of note is the wide range of his sympathies. Revivers of ancient philosophy, scientific investigators, magicians and alchemists, political thinkers, mystics and original philosophers are successively passed in review, and everywhere we feel that the author has more than a mere external interest in his subjects, that he has himself seen things in turn from all the points of view that he is describing. Every chapter is drawn from original sources ; and while there is no want of detailed information, a clear general idea is conveyed of the meaning of each movement and the purport of the doctrines of each individual thinker. The minor figures of the Renaissance and the Reformation are not neglected, and indications are given of the nature of the preparation for both

movements in the later Middle Age; the German mystics of the fourteenth century in particular being dealt with at considerable length. The biographies and the general historical background make the book full of human interest.

The general introduction and conclusion being counted separately, the first four chapters deal with movements, the rest, except the sixth—which is a short introduction on “Religion and Philosophy in Italy,” placed at the beginning of the second volume—with individual thinkers. The movements dealt with are (1) the revival of Greek philosophy, (2) the scientific movement and the occupation with “magic,” (3) the effort after social and political reform and the speculative ideas in which it found expression, (4) German Mysticism and the Reformation. The writers who are considered to be of sufficient philosophical importance to demand treatment in separate chapters are Böhme, Cardan, Telesio, Bruno, Vanini, and Campanella. The short sixth chapter (ii. 1–6) is chiefly a study of Savonarola.

The chapter on Giordano Bruno is the longest in the book, and for the author Bruno is the centre of interest. These reasons might suffice to justify a critic in devoting special attention to that chapter. There is, however, the additional reason that the writer of the present notice will thus be discharging an old engagement. Prof. Carrière’s general view of Bruno has been adopted by the author of the English *Life of Giordano Bruno*, recently published by Messrs. Trübner, for the appearance of which the continuation of a former article on Bruno in *Mind* (vol. ix.) was reserved. Such a critical estimate of Bruno’s philosophical position as was promised in the post-script to that article must necessarily be stated or implied in any detailed judgment on Prof. Carrière’s chapter. The present review, in dealing with this chapter, will accordingly be at the same time a fulfilment of the promise then given. In making the chapter on Bruno the main subject of criticism, we shall not lose from sight Prof. Carrière’s general purpose, which, as has been explained, is more than merely historical, being to treat the philosophers of the Renaissance and Bruno in particular in their relations to the present time. His treat-

ment of Bruno is, besides, more open to criticism than his treatment of philosophers for whom his admiration is less; for this admiration causes him to see in Bruno greater agreement with his own philosophico-religious ideas, and with those of the mystics whom he equally admires, than really exists.

As Prof. Carrière would have us return to Giordano Bruno in order to recover a totality of view that the moderns have lost, so he would have us return to Jacob Böhme and to the German mystics of the fourteenth century, Böhme's predecessors, in order to set reformed Christianity free from the dogmatic fetters imposed by Luther and Calvin. Now, of course, he cannot help recognising the differences between Bruno's poetical philosophy and Böhme's mystical theology; yet he tries to show that in spite of all differences the Italian philosopher and the German mystic are in agreement "in their highest ideas." Above all, there is in both alike a final "reconciliation of Theism and Pantheism." This reconciliation, he contends, is to be found in Christianity rightly understood. Already in the fourteenth century Eckhart, Suso and Tauler had caught sight of it as by inspiration. Marsilio Ficino and other Platonists of the early Italian Renaissance also had glimpses of it. Towards the clearer vision of this reconciliation the whole of modern philosophy has been tending. Opposite ideals of life, too, are approaching their reconciliation. Protestantism, favourable as it was in the end to exact learning notwithstanding the dogmatic formulas by which its growth was long checked, has brought about a new revival of Hellenism in Germany; and "this reawakened Hellenism is no other than what the Christian Jacob Böhme has depicted as the life of the new birth."

Of the manner in which "philosophical Mysticism" overcomes and reconciles the opposition of "Deism" and "ordinary Pantheism" two different accounts are given. Sometimes it is represented as combining in a single conception the ideas of the universe or of the Infinite, and of God as "self-conscious Spirit;" sometimes as a union of the ideas of the "transcendence" and the "immanence" of God. If,

however, theism and pantheism are to be combined in a single conception, it is the last contrast that is all-important. God may be identified with self-conscious spirit to the entire exclusion of nature, which may be regarded as an illusion or a mere negation, and the doctrine may still remain pure pantheism. Theism, in any intelligible sense, means the idea of God, in Spinoza's phrase, as "princeps et legislator," as a personal being ruling the course of things and judging the actions of men. This is what seems to be meant by the doctrine of "transcendence." On the other hand, what is common to all forms of pantheism is the doctrine of "immanence." The ultimate explanation that deism and monotheistic theology seek outside and above the universe, pantheistic philosophy seeks within the universe. But for pantheism itself there remains the opposition of nature and mind, an opposition which is expressed with perfect clearness by Euripides (*Troades*, 886) in the alternative—Ζεὺς, εἴτ' ἀνάγκη φύσεος εἶτε νοῦς βροτῶν, and therefore was not first revealed to consciousness by Christianity, as Prof. Carrière almost seems to hold. According as it takes one or the other side of this alternative, pantheistic philosophy may assume the form either of what Prof. Carrière calls "naturalistic pantheism" or of what may be called spiritualistic or intellectualistic pantheism; or it may seek to unite the two opposites in a single conception. Now this opposition of nature and mind is that on which Prof. Carrière principally dwells. When he speaks of "ordinary pantheism," it is naturalistic pantheism that he means; and in most cases when he speaks of the union of pantheism and theism he means the union of the ideas of nature and mind. As he does not clearly distinguish this opposition from that of immanence and transcendence, but rather seems to regard them as the same, identifying the idea of a transcendent and personal God with the idea of God as intellect or spirit, it is necessary to consider separately how far there is an effort at reconciliation of either pair of opposites on the part of Bruno and of the Christian mystics.

Now there is no doubt that Christian Mysticism really affirms a Deity who is at once immanent and transcendent,

or in the universe and above the universe. The mystics identify the transcendent and personal God of theology with an internal divine principle manifested in nature and in the human mind. Thus they may be said to combine, if they do not reconcile, the theistic with the pantheistic position. The pantheistic element of their doctrine, however, tends to gain the mastery; hence accusations of heterodoxy against the mystics. Prof. Carrière himself sometimes seems to reject altogether the idea of an extra-mundane Deity, and in one place he ascribes this rejection to Böhme; yet in other places he affirms it as the necessary complement of the pantheistic element of his doctrine. The consistent pantheism of Spinoza rejects the idea of a transcendent God altogether, but at the same time seeks to unite the conceptions of nature and mind by making thought and extension attributes of the same substance. Is Bruno to be classed with Spinoza, or, as Prof. Carrière contends, with the Christian mystics?

According to Prof. Carrière there is evidence of development in Bruno's writings. In the *De Umbris Idearum* he is a Platonic Idealist; afterwards, in the Italian works composed in England, he gives clear expression to naturalistic Pantheism; finally, in the Frankfort books, and especially in the *De Immenso*, the theistic element becomes distinct. If then in the *De Immenso* Bruno not merely leaves aside but positively rejects the doctrine of transcendence, this is conclusive against Prof. Carrière's contention for the theistic character of his doctrine.

That there are passages in the *De Immenso* obviously directed against the New Testament miracles and the doctrine of the Incarnation, as well as the mysteries special to Catholicism, may not by itself be sufficient to prove that Bruno does not hold the doctrine of transcendence in common with the Christian mystics. Even a passage such as this is perhaps not decisive, though the very idea of miracle in the sense in which its possibility at least must be admitted by a theist, is rejected precisely in the spirit of Spinoza. Referring to comets, of which he gives a naturalistic explanation correct in principle, Bruno says:—

"Some fly to a virtue above and beyond the natural, saying that a God who is above nature creates those appearances in heaven in order to signify something to us: as if those things are not better and the best signs of the divinity which come to pass in the ordinary course, among which those appearances also are not disorderly; although their order may be concealed from us: but with prophets of this kind we do not speak, nor shall we be careful to answer them where it is not necessary to speak without sense and reason." (*De Immenso*, iv. 9.)

In the last book of the *De Immenso*, however, there is still more unambiguous evidence of Bruno's position. For a great part of this book is a polemic against the doctrine of transcendence as it was held by Palingenius and other Platonists. There is no "supernal," "intelligible," "immaterial" light, Bruno tells the Platonists, such as they imagine outside the world, no light except that which shines within the mind and outside us in nature—

"Quæ importunissima pulsat
Pectora, quæque intus nobis splendescit et extra."

"Nature" is the name for a principle that is within things; and the law by which all things accomplish their course (*lex qua peragunt proprium cuncta entia cursum*) is nothing but a logical abstraction (*abstractum quiddam logica ratione*). The whole is summed up thus:—

"God is infinite in the infinite, everywhere in all things, not above, not without, but most present, as entity is not outside and above beings, as nature is not outside natural things, as there is no goodness outside that which is good. But essence is distinguished from being only logically, and as reason from that of which it is the reason."

Passages such as these throw light on the distinction, which in various forms is sufficiently frequent in Bruno, between God as absolute intellect and the manifestation of God in nature and in the human mind. When, for example, he distinguishes truth "before things," "in things" and "after things," he is applying in the sense of his own philosophy a traditional logical distinction recognised by him as no more than logical. By the distinction of God as absolute from the

knowledge of God is expressed the imperfection of all actual conceptions of the divinity as compared with their ideal completion. Thus in the *Eroici Furori* the mind is represented as striving to identify itself with the absolute unity of the divine intellect, and as constantly baffled in this desire of unattainable knowledge. Nature or the infinite universe as distinguished from the divinity itself is variously called the "image," the "shadow," the "simulacrum" or the "attribute" of the primal intellect, which may manifest itself by other attributes, all of which must be infinite and eternal. The possible existence of unknown attributes (on which, for the rest, Bruno does not dwell) again necessitates the distinction of God as absolute from the manifestation or "reflexion" of God in things.

This may perhaps in one sense be called a doctrine of "transcendence," but it is not to be confounded with the theistic "transcendence," which implies a possible supernatural or miraculous. When Bruno speaks of a God who is known by supernatural light (as, for example, in *Della Causa*, ed. Wagner, i. 275) it is as an object of faith, with which philosophy is not concerned; and he sufficiently explains his attitude towards faith elsewhere. Although, however, there is no distinctively theistic element in Bruno, Prof. Carrière is right in insisting that his doctrine is not simply a naturalistic pantheism. Just as much as Spinoza, though in a different way, he seeks to overcome the dualism of nature and mind. And the conjecture that there is a development in his writings from a more naturalistic to a more spiritualistic doctrine is in itself plausible; for, in a passage of *Della Causa*, "Teofilo," the representative of Bruno, declares that he once inclined to the opinion of "Democritus and the Epicureans," who say that that which is not body is nothing, and who consequently will have it that matter alone is the substance of things and is also the divine nature, as was said by Avicbron in the *Fons Vitæ*; but that, having more maturely considered, he had found that it is necessary to recognise two kinds of substance—"matter" and "form" (Wagner, i. 251). Nevertheless there seems to be no evidence in Bruno's existing

writings of such a development. Both sides of his doctrine are already clearly present in the *De Umbris Idearum*. The *Eroici Furori*, published in London, is chiefly expressive of its spiritualistic or Platonist side. And in the Frankfort books there are expressions of its naturalistic side identical with those of *Della Causa*.

The truth seems to be that before writing anything philosophical Bruno had arrived at the pantheistic doctrine of which an expression, as of something already familiar to him, is found in the dedication of his Italian comedy *Il Candelaio* and in some elegiacs at the end of the *De Umbris Idearum*. In these condensed expressions the stress is laid on the unity and permanence of substance and the eternity of vicissitude. Vicissitude, according to Bruno's philosophy, is possible only by the coincidence of contraries in the one Principle of things. The one Principle, the identity of unity and infinite number, becomes explicit in the productive energies and varied forms of nature. Nature produces the human mind, and the mind seeks to return, by intellectual concentration, to the unity of its principle. Thus the source of things and the end to which they aspire are one and the same.

A more correct interpretation of the doctrine of which this is an outline has been arrived at by M. Renouvier in his *Classification systématique des Doctrines philosophiques* when he describes Bruno as the most consistent of all pantheists in so far as he most explicitly makes the contrast of good and evil vanish with all other contrasts in the Absolute, than by Prof. Carrière when he sees in it theistic elements. That this consistent pantheism does not lead to a moral indifference such as M. Renouvier thinks ought to be its consequence, is evident, however, from the passages in which Bruno touches upon ethical questions. In the *Spaccio* he pronounces a strong condemnation on all that in modern times has been called "Machiavellism," with obvious reference to some positions of Machiavelli himself (Wagner, ii. 217). Like Lucretius, he has in view the ethical applications of his philosophy; showing how it "takes away the dark veil of the mad opinion concerning Orcus and the

greedy Charon," how it destroys the fables that are related of maleficent gods, "the dogmas of the sycophants"—

"Absona quæ ingenio, et sensu constantia nullo
Humanam turbant pacem sedlique quietem,
Extinguunt mentis lucem neque moribu' prosunt."

His attacks on historical Christianity are above all on ethical grounds, and it is especially the practical accompaniments of the creed in his own day that move his indignation. His *Bestia Trionfante*, in one of its significations, has precisely the meaning that modern criticism finds in Voltaire's *Infâme*. Among the manifestations of the monster, the chiefs of the Catholic Reaction are not obscurely indicated.

The general nature of Bruno's treatment of theological mysteries in the *Spaccio* and of his "Euhemeristic" theory of mythology is very well brought out by Prof. Carrière, though he does not perhaps quite see that intellectually Bruno was specially hostile to the three monotheistic Semitic religions, for the reason that he found more easily in polytheism an exoteric expression of one side of his philosophy. In his attitude towards theology, to judge from one passage (ii. 99), Prof. Carrière supposes that there was a development—his later books being less contrary to the faith than his earlier—and that this development is established by Bruno's own words before the Inquisition at Venice. Prof. Carrière's interpretation, however, is not borne out by the passage in the documents that seems to be referred to (Berti, *Vita di Giordano Bruno*, p. 353). And, as a matter of fact, the Latin poems, while they contain fewer passages directed against theological doctrines than the *Spaccio* and the *Cabala*, contain more than *Della Causa* and *Dell' Infinito*, to which in their general subject-matter they closely correspond.

There are, no doubt, variations of mood in Bruno's attitude towards Christianity; but not such as indicate any real change of mind. When he speaks favourably of "the theologians" it is on the supposition that they are willing to tolerate philosophy and even to recognise it as superior to theology. The religion of philosophy is for the few, the

religion of faith for the many, who are unable to rise to philosophic virtue or have not sufficient natural goodness to act rightly without external law. By those who are only capable of faith and not of reason, the moral precepts of religion must be accepted as commands, and the theologians, having practice alone in view, may attach to them as sanctions doctrines which the philosophers from the point of view of free speculation may reject. But when false leaders arise who, seeking their own gain under the pretext of promoting religion, teach that the gods care only for the beliefs of men, when they extol ignorance and credulity as superior to knowledge and reason, and persecute those who hold other opinions, they are to be regarded as Hydras and Chimæras worse than those of old time; and to overcome them is the task of the heroes of the present world. "True fathers and shepherds of the people" have never prejudiced the liberty of philosophers.

This attitude of Bruno explains perfectly his partial submission to the Church before the Venetian tribunal. As Prof. Carrière says, he had no intention of recanting his philosophical ideas. "He recanted his ecclesiastical heresies, not his philosophy." And in return for this purely formal submission in matters of theology, he wished to be free to pursue his philosophical career, not merely as a student but as a writer, without molestation. His hope was that the fury of the Catholic reaction had abated, and that the new Pope, who was said to be favourable to learning, might accept the dedication of a book he had just composed. Some have found a difficulty in reconciling with this submission his subsequent refusal to recant certain propositions drawn from his writings. The difference, however, from Bruno's point of view, between a submission to the Church in theology, implying only that he had no intention of directly attacking the popular faith and was not an adherent of any new sect, and the unconditional recantation of propositions of his own philosophy, seems sufficiently obvious.

At the end of his exposition Prof. Carrière makes some interesting and instructive comparisons of Bruno with later

philosophers. The analogy with Spinoza has always been the first to suggest itself. This analogy Prof. Carrière draws out in the manner already indicated. In Bruno he finds the original harmony of the doctrines of the unity of the world and the individuality of its parts that were developed in a one-sided manner by Spinoza and Leibniz; and he further contends that to the Spinozistic notion of substance Bruno added the conception of a divine "self-consciousness." This last contention, although not admissible in the precise form in which Prof. Carrière defends it, has yet an element of truth. Bruno, like Spinoza, calls the extended world an "attribute" of God; but with Bruno thought is not simply an attribute parallel with extension, but, as absolute, is identified with God himself. The idea of personality, or of "self-consciousness" in the special sense, is no more present, however, in Bruno's doctrine than in Spinoza's. The doctrine of absolute thought as the unity from which all things proceed and to which they aspire according to the degree of their perfection, is the spiritualistic side of Bruno's pantheism. On the other side, he also identifies Nature, in one of its meanings, with God. "*Natura est Deus in rebus.*" Nature, again, is sometimes identified with matter, and from matter all forms of things are said to proceed; nature, as an "internal artist," producing the more perfect from the less perfect. By "matter" is not to be understood here the matter of the Epicureans, but matter as coinciding in the absolute with "form," or matter to each element of which is joined an element of spirit, so that the world is animated as a whole and in every part. It is to express this side of his doctrine and not the properly spiritualistic or intellectualistic side that he quotes the well-known lines of Virgil, ending—"Mens agitat molem et magno se corpore miscet." By the substitution of "toto" for "magno"—a variation which always occurs in his quotation of this line—the idea of the universal animation of the world, rather than of its direction by intelligence, is still more accentuated. The notion of intelligence as directing things finds its expression in the identification of Fate with Providence; but the perfection of the world which is said to

be its final cause is not an ultimate state, but is the actualisation of all possibilities. In the theory of particular things, of the life of animals, for example, this doctrine becomes what is now known as the doctrine of "internal teleology." All things seek their own preservation according to the knowledge they have of that which is conformable or opposed to their nature. The actions of ants and spiders, for example, are not directed from without by "unerring divine intelligences," but from within "by their own prudence and artifice." What seems extraordinary in the actions of some animals, Bruno suggests, may be explained by supposing that they have senses which man has not. In what relates to the souls of individual things, Prof. Carrière has noticed especially resemblances to Leibniz. As the terms "mode" and "attribute" are used incidentally by Bruno in the Spinozistic sense, so the terms "*monas*" and "*Monas monadum*" are used by him in the Leibnizian sense. He also puts forth the Leibnizian doctrine that no two individual things in the universe are absolutely alike. The principle of "the coincidence of contraries," derived immediately from Nicholas of Cusa, by which he combines the opposite terms of his pantheism—the indivisible intellectual unity to which the mind aspires and the infinite multiplicity of a universally animated nature, has obvious resemblances to the dialectic of Hegel. Individual things are represented as all in perpetual mutation, some approaching and some receding from the absolute unity; every soul or central monad occupying in turn all positions in "the wheel of metamorphosis." If those interpreters of Hegel are right who say that he teaches no real evolution in time but only a "dialectical" evolution, then Bruno's philosophical doctrine is more nearly than Hegel's an anticipation of the tendency of modern science.

In his attitude towards science, as Prof. Carrière says, Giordano Bruno is a guiding star for philosophers. The confidence with which he took up the Copernican astronomy into his system, has been entirely justified by the succeeding centuries. That theory, in his day, was in the position of the theory of organic evolution before Darwin; and it ought to

be remembered that he not only accepted the theory of Copernicus but made an extension of it which has also become a permanent scientific possession. Isolated suggestions of ideas that have since become important or celebrated have frequently been pointed out. The saying, for example, that the moderns are in reality older than the ancients, occurs in Bruno. The preference he expressed for the earlier philosophers of Greece in physics and metaphysics, while allowing the supremacy of Aristotle in "the humanistic sciences," has been shared by many later students. He in a manner anticipated "the Cartesian doubt," as is pointed out by Prof. Carrière, though he did not make it the beginning of a systematic theory of knowledge. In all that relates to "theory of knowledge," indeed, it must be admitted that Bruno remains outside the specifically modern philosophic movement. The modern distinction of subject and object, dating from Descartes, could not of course be present to him. This makes it difficult to compare his philosophy with any system that starts from Cartesianism. His general doctrine, when compared with Spinoza's parallelism of the attributes of extension and thought, appears to be predominatingly idealistic; and this brings him nearer in some respects to later philosophy; but his idealism cannot be identified with any form of post-Cartesian idealism. At the same time it is not mere Platonism. Bruno's doctrine of matter in *Della Causa* is alone sufficient to distinguish him from the ordinary Platonists.

The ideas of his philosophy, like those of the pantheistic philosophy of the Renaissance in general, are of course largely drawn from Neo-Platonist sources. And his mediæval precursors in the theory of matter—Avicbron and David of Dinant—had started also from Platonism. Bruno, however, does not suppose himself to be simply passing on their theory, as has sometimes been assumed, but, while commending them for what they affirm as to the permanence of the material principle of things, finds their mode of expression inadequate, as not taking account of the formal principle which is eternally conjoined with matter, but

only of accidental forms. With Bruno's doctrine of matter goes his substitution of an evolution-theory for the emanation-theories of the Neo-Platonists. Here he was probably influenced by the Stoics, and by the earlier philosophers of Greece, whom he constantly cites. Indeed there was no form of speculative thought known to his age by which he was entirely uninfluenced. This receptiveness is joined with an equally remarkable freedom. Of the submission of the spirit to external authority not a trace remains. His laudatory citations from all sources—philosophical and poetical, orthodox and heterodox, classical and biblical—are above all the expression of an intellectual or æsthetic admiration. In a writer of the sixteenth century this is at first sufficiently surprising; but it is characteristic of the freer spirits of the time. The reactionary return of the past is illustrated when, in the next age, we find Campanella, some of whose speculations have so much affinity with Bruno's, laboriously establishing his points by quotations from the Fathers. We moderns, Prof. Carrière says in commenting on this, have no longer any conception of the despotism of authority that then reigned. It ought to be added that for a brief interval and by a small number of minds this despotism had been thrown off, though long efforts were required before the more widely extended emancipation of modern times could be attained and made practically secure.

Whatever criticisms it may have been necessary to make on Prof. Carrière's general view of Bruno's doctrine, the great merits of his exposition are beyond dispute; and much of the spirit of Bruno has passed into the translations of verse from the Frankfort books and the *Eroici Furori*. The life has of course been re-written so as to include the results of all the documents published since 1846. For illustration of the sources and historical relations of Bruno's single ideas Bartholmæss must still be read; while Prof. Carrière's treatment of the whole philosophical history of the age supplies fuller information as to his intellectual surroundings and immediate antecedents. The only fault of the chapter on Bruno as a literary and philosophical study is the tendency that has

already been remarked to tone down some of his distinctive ideas. That this is not entirely without effect on the details may be briefly shown by comparison of the last pages of Prof. Carrière's systematic exposition of the philosophy (ii. 160-2) with the passage in the dedication of *Dell' Infinito* of which it is for the most part a somewhat condensed translation.

Here is a portion of the passage as given by Prof. Carrière:—

"We fear not, therefore, that the multiplicity of things on this earth by the power of some black wandering demon, or by the anger of a thundering Jupiter, should be hurled out of this dome and shattered and dispersed beyond this vault of heaven or crumble to dust outside the starry mantle above us; for nature cannot perish in essence, and vanishes only in appearance, like the air in a burst bubble. *There is no succession of things without an eternal ground, a first and a last.* There are no limits and walls that should confine the infinite and bound its fulness."

The sentences to which these correspond in Bruno are as follows:—

"We fear not that that which is accumulated in this world, by the vehemence of some wandering spirit, or by the anger of some thundering Jupiter, should be dispersed out of this vault or dome of heaven, or shaken and scattered as in dust out of this starry mantle, and the nature of things not otherwise become void in substance than to the appearance of our eyes that air which was comprised within the concavity of a bubble is dissipated; *for there is known to us a world in which for ever thing succeeds thing, neither is there any ultimate profound, from whence, as from the hand of the smith, they should irreparably vanish into nothingness.* There are no limits, terms, margins, walls, that should defraud us or withdraw from us the infinite fulness of things."

The remainder of the passage concludes from the infinite power of God that the universe, or eternal image of God, must be infinite also, on the ground that in God will and power, act and possibility, coincide. The last sentences are thus expounded by Prof. Carrière:—

"Not vain is the power of the understanding to add apace to apace, unity to unity, mass to mass, number to number; thereby it breaks the chain of the finite and raises itself to the freedom of the infinite; thereby it is loosed from the poverty and exults in the riches of life, and no Pluto can hold it imprisoned, no sphere bound it. Nature is an all-fertile mother, and God *is not envious but is love itself.*"

In Bruno they are as follows:—

“ So that not vain is this power of intellect which ever will and can add space to space, mass to mass, unity to unity, number to number, by that science that unbinds us from the chains of a most narrow and promotes us to the liberty of a most august empire; that takes us from the believed poverty and narrowness to the innumerable riches of so great a space, of so worthy a field, of so many cultivated worlds; and lets not circle of horizon counterfeited by the eye on earth and feigned by fantasy in the spacious ether imprison our spirit under the wardship of a Pluto *and the compassion of a Jove*. We are exempt from the care of so rich a possessor and then so parsimonious, sordid and avaricious a giver, and from the nurture of a so fertile and all-pregnant and then so meanly and miserably parturient Nature.”

Now, of course, as Prof. Carrière is not ostensibly translating from *Dell' Infinito*, but is using it as material for his own interpretation, he has a right to make alterations. The words omitted from the passages just quoted, and a sentence praising “Democritus and Epicurus,” which is omitted from the intermediate passage, may seem to Prof. Carrière incongruous or not characteristic; as, perhaps, according to his theistic interpretation of Bruno, they are. And he could find support for the words substituted. The reason why his variations in this particular case have been cited is to indicate exactly where he may seem to readers who do not approach the subject with his pre-suppositions to fall short of perfect appreciation of Bruno's way of thinking. Within the limits imposed by the desire to approximate the philosopher of Nola to the Christian mystics, neither his general interpretation nor his detailed exposition could be better.

DEAD MATTER AND LIVING MATTER.¹

THE extremely suggestive speculations of this last work of Prof. Delboeuf have their foundation partly in the psychological conclusions of his immediately preceding work, *Le Sommeil et les Rêves* (reviewed by Mr. Sully in *Mind*, No. 45), partly in his psycho-physical theories. His physical and his psychological ideas find their point of union in the general doctrine stated in the first chapter of the present essay. In opposition to the prevailing "philosophy of men of science" that starts with lifeless atoms and regards life and mind as the result of their combination, the author assumes that life is coeval with the universe, and that the lifeless can only be explained from the living. Inorganic matter and its "fatal" actions are a "residue" of "vital," "intelligent," "free" actions. All the matter of the universe was primitively vital; and "intelligence is the true demiurgus"; for it is by the free action of intelligence that the transformation of living into dead matter is retarded.

We know what it is to be alive, but we do not know what it is to be dead. It is death, therefore, not life, that needs explanation. The explanation is to be sought in a study of the processes of nutrition, generation and birth. From the study of nutrition we may perhaps learn what distinguishes living from not-living matter and how one is transformed into the other. And the problem of death is bound up with the problems of birth and generation; for death implies birth, though

¹ *La Matière brute et la Matière vivante. Étude sur l'Origine de la Vie et de la Mort.* Par J. DELBOEUF, Professeur à l'Université de Liège. Paris: F. Alcan, 1887. Pp. 184.

birth does not imply death. That which has a beginning will not necessarily have an end, but that which has an end must have had a beginning.

In his chemico-physiological study of nutrition, which, as he says, in its positive part merely summarises (but in a very luminous and interesting way) the results of science, the author arrives at the general conclusion that living matter is "relatively unstable," dead matter "relatively stable." "Food" is defined as "a substance which, introduced into the organism, divides itself into two parts: one, more unstable, which is assimilated; the other, more stable, of which a part is deposited, for example, in shells, teguments, the skeleton, &c., and of which the other part is eliminated." The "unstable" part is that which retains most "potential energy." The transformation of "stable" matter into "unstable" that takes place during the assimilation of food is necessary because, during the activity of the organism, forces are constantly becoming "fixed," and with this "fixation of force" goes "the stabilisation of matter." Psychologically, what corresponds to "fixed" force or "stabilised" matter is the definitely organised portion of the mental life, the perceptions that have become memories of the past, the acts of will that have become organised into habit. In the nervous system there is a stable portion that has been already utilised and an unstable portion that is still disposable. The tendency is to greater "stabilisation." Nutrition cannot continue for ever to replace the lost potentialities of change. Thus there arrives a time when the organism no longer retains the capacity of transforming itself. Its "relative stabilisation" has reached the degree known as "death."

The division into a free or "unstable" and a "mechanical" part on which it depends for its specific and individual characters only appears in the higher organisms. And a higher organism is not completely unstable even at the beginning of its life. There is a "mechanism transmitted by generation," which is "the will and intelligence of ancestors." In every individual there is a psychological "nucleus" of instinct or hereditary habit. And, physiologically, the ovum is not in-

different, but has a tendency to grow into a certain specific and individual form. What is made possible by the process of generation is the recovery, for another individual, of a portion of the "instability" that pre-existing individuals must lose. True or sexual generation is itself made possible by the specialisation that is the result of cell-division. Death of the individual, as has been seen, is the consequence of the specialisation of a complex organism, its division into a stable and an unstable part, and of the tendency of the latter to become stable, so that no further change is possible. Generation is now seen to be the correlative of death. For only by the double process of death and generation is the continued existence of specialising organisms possible. In the case of those unspecialised organisms that multiply by "fission" there is "birth," but, as there is no true (that is, sexual) generation, so there is no "death," except from external accidents. These lowest forms of life are "immortal." We cannot apply to them "the integral notion of natural death," for they "leave no corpse." "But also we cannot apply to them the complex notion of individuality, physical or psychical, since this comprises indivisibility and mechanism."

The discussion of individuality in its relation to generation naturally suggests the question, What is permanent in the individual? Is it a certain portion of matter, an atom or a group of atoms, already present in the germ and unchanged through life, or is it merely a certain form? Can we suppose, as physiologists usually do, that all the matter of the organism is "fluent," and that physical and psychical identity is still preserved, or does individual identity require some material substratum however small? The author inclines to the second alternative. He shows that there is no absolute proof that at the end of a certain time (usually fixed at seven years) every particle of matter in the body has been exchanged with another from outside. It is possible that the matter of the "stable" parts is more persistent than physiologists suppose; and the supposition that a certain portion of germinal matter persists from birth to death is incapable of disproof. The whole body, it is suggested, may be regarded as "a single molecule of

infinite complication" consisting of atoms collected around itself by the germinal group on which depends the identity of the organism. This theory is not fully worked out, but, as far as it goes, it is strikingly similar to the theory recently elaborated by M. Burnouf in *La Vie et la Pensée* (see *Mind*, xii. 302).

In Prof. Delboeuf's general speculation, however, the conception of a "monad" as the basis of life and thought is not characteristic. What is distinctive of his theory so far as it relates to the ultimate constitution of things, is his substitution of the atoms of Empedocles for the atoms of Democritus. "The primordial elements of the universe are endowed with sensibility, intelligence and liberty." The primitive state, in which they wandered at hazard, is that which the poets have called "chaos." It has only a hypothetical existence; for, immediately after their birth, the elements collided with one another, and, affected in their sensibility, applied their intelligence and their liberty to flee disagreeable and to seek out agreeable encounters. Thus they created for themselves sympathies and antipathies, affinities and repugnances, loves and hatreds. They began to enter into unions with one another, sacrificing part of their liberty for the sake of relative peace, and forming "habits," which became the laws of the universe. Every sensation is the accompaniment of a precipitation of the unstable into the stable. "Laws are the residues of acts primitively free." At first the elements were infinite in number, and each was infinitesimally different from all the rest. Insensibly this infinite primitive variety gave place to groups of substances capable of harmonising, and, among the groups formed, differences more and more profound manifested themselves. Organic molecules were formed, and, in special agglomerations of these, liberty, intelligence and sensibility became more and more concentrated.

Every transformation ends by replacing the transformable by the untransformable. The exercise of life precipitates the unstable into the stable, the living into the dead. Life, indeed, passes from body to body. Dead or relatively stable matter is transformed into living, or relatively unstable matter;

but this "is only possible at the expense of an inverse and greater precipitation of the unstable into the stable. With true corpses, if such there were, life could never be re-made." The evolution of the universe is therefore from absolute instability to absolute stability. Primitively, "every individual was a species," and there were no harmonising groups. When every particle of the universe has taken up a final position in relation to all the rest, there will be a single universal intelligence having clear consciousness of the whole universe as a single organism. This is the final term of the transformation of things.

The law of "the fixation of force" from which Prof. Delboeuf draws the conclusion that the transformations of the universe must have a term is for him both a psychological and a physical law. Its physical expression is of course the law of the "dissipation" or "degradation" of energy. The author has sought the solution of the problem of death, he tells us, "in that great law, the conquest of our century, according to which everything precipitates itself towards its own destruction in spite of, and because of, the very efforts it makes to maintain itself." That this law, if applied to the sum of things, requires a final term, is incontestable. It may be contended, however, that a different kind of final term would be more logically deduced. Instability, defect of equilibrium, Prof. Delboeuf says in one place, "is something," while stability is only a kind of residue from which nothing more can be obtained. From this it seems to follow that the end of things, being absolute stability, must be the "absolute death" affirmed as the end in Mainländer's pessimistic *Philosophy of Redemption* (see above). If the whole process of things consists in a perpetual diminution of "free" force, then the unity of the world ought to be placed, as it is by Mainländer, at the beginning and not at the end. The more the theoretical basis of the *Philosophy of Redemption* is examined, the more clearly it will be seen to be a perfectly coherent (perhaps the only coherent) metaphysical doctrine starting from the assumption of the law of the degradation of energy as the most generalised expression of cosmical change.

The precise extension of this law, however, is still a matter of dispute among physicists. We may safely say that the law of the degradation of energy is not co-ordinate with the law of the conservation of energy, but is true only under special, and as yet imperfectly defined, conditions. Those who, like Prof. Delboeuf, apply it to the whole, ought to define clearly their assumptions as to the constitution of the whole. On slightly different suppositions, would not the process of things take the form of a cycle rather than of a movement from an absolute beginning to an absolute end?

In Prof. Delboeuf's theory of the relations of stable and unstable matter, and of "mechanism" and free intelligence, there is both a speculative element and a positive element. The speculative element consists partly in the theory of the whole process of things that has just been discussed, partly in a theory that acts of free intelligence or will are strictly undetermined. The distinction between the stable and the unstable, it is clear, is not bound up with the assumption that when once a certain portion of force is fixed, the possibilities of change are for ever diminished by so much. And, similarly, the rejection of indeterminism does not affect the psychological distinction drawn between "free" intelligence and fixed habit or "mechanism." The doctrine to which Prof. Delboeuf's theory is really opposed is not determinism, but the doctrine that regards mechanism or unconscious habit as an expression of the perfection of an organism, and consciousness as a sort of aberration expressive of defective function. Again, the psychological distinction of mechanical habit and free intelligence can be maintained independently of any attempt to discover a corresponding objective distinction, such as that between stable and unstable matter; though this last distinction, of course, has a value of its own. It may be regarded as an expression in terms of chemistry and molecular physics of what has already been expressed physiologically in Prof. Herzen's "physical law of consciousness." With the whole exposition of the relations of stable and unstable matter, Prof. Herzen's recent statement of his psycho-physical law (in his *Conditions physiques de la Conscience*) ought to be compared.

The two expositions illustrate the convergence of different lines of thought to the same result. They also show the illusory character of the attempt to make unconsciousness superior to consciousness. The formation of a mental "habit," the "fixation" of a portion of force, or the "stabilisation" of a portion of matter, may of course indicate a psychological advance; but (as Prof. Herzen shows in opposition to Dr. Maudsley) this advance does not consist in the transformation itself of intelligence into habit or instinct, but in the making possible, by the new habit, of a new kind of free consciousness superior to that which was possible before.

The more speculative parts of Prof. Delboeuf's essay are, as has been already said, put forth by him simply as speculations. He does not bring them into definite comparison, on philosophical grounds, with the type of speculation to which he opposes them, but is content to claim for them equal possibility. Such comparison would not be unprofitable. Much might be said of the relation of his general point of view to idealism, and of the relation of his physical to his psychological speculations. The philosophical value of the essay is, however, less in any completed metaphysical doctrine than in its varied suggestions. In view of this, it will perhaps be best to refrain from further criticism, and not attempt to fix in a rigid form what is for the author an attempt to break through the limits of one dogmatism rather than to construct another.

ON FREE-WILL.¹

A PRETTY full summary of M. Fonsegrive's Essay on Free-will has already been given in *Mind*, xii. 621. From the mere statement of the author's results, it must have been obvious that the book was one of no ordinary merit. The historical part of the Essay is, indeed, not only a good history of the question of free-will so far as the facts are concerned, but at several points throws new light on the development of doctrines; while its critical and positive part contains one of the best recent statements of the indeterminist position. On all these grounds, some more detailed consideration seems desirable both of the historical and positive conclusions arrived at or suggested by it than was at first possible.

It must be recalled that M. Fonsegrive's indeterminism is founded on the spiritualistic conception of the soul, and that his definitions and distinctions are attached historically to those of the accepted representatives of Catholic theology. In both these respects his doctrine differs from the indeterminism of M. Renouvier, with its phenomenist basis and its divergence—as regards, in particular, the doctrine of divine prescience—from theological indeterminism. It is, however, from M. Renouvier that M. Fonsegrive has adopted his method of proof by appeal to the “practical reason”; and, partly in

¹ *Essai sur le Libre Arbitre, sa Théorie et son Histoire.* Par GEORGE L. FONSEGRIVE, Professeur agrégé de Philosophie au Lycée de Bordeaux. Ouvrage couronné par l'Académie des Sciences Morales et Politiques. Paris: F. Alcan, 1887. Pp. 592.

Die Willensfreiheit des Menschen. Von FR. J. MACH, k.k. Professor am Staats-Obergymnasium in Saaz. Paderborn u. Münster: F. Schöningh, 1887. Pp. ix., 274.

consequence of this, he states with exceptional clearness the modification that indeterminism makes in the conception of scientific law.

The extent of M. Renouvier's influence may be seen by comparing M. Fonsegrive's Essay with Dr. Mach's, published almost simultaneously with it, and briefly noticed in *Mind*, xii. 631. The essential points of Dr. Mach's indeterminist theory are exactly the same as those of M. Fonsegrive's. It is distinguished, as "relative indeterminism," at once from "absolute determinism" and from "absolute indeterminism." It is made dependent on the doctrine of an immaterial soul of which not all the operations are correlated with processes in the organism, and it is attached in the same way to the orthodox Catholic doctrine. Just as M. Fonsegrive finds it necessary above all to fortify his position against the psychological determinism of the English empirical school and its French representatives, so Dr. Mach is especially concerned to oppose the psychological determinism of the Herbartians. Both writers make a decided advance in the psychological statement of the indeterminist position; rejecting the term "liberty of indifference" and much of the old phraseology about "the will" as a power independent of "motives." Where the difference appears is in the mode of proof of their thesis. There is, indeed, an almost verbal resemblance between Dr. Mach's argument that, when "absolute indeterminism" and "absolute determinism" have been refuted, "relative indeterminism" may be regarded as proved, and the same argument as stated by M. Fonsegrive. M. Fonsegrive, like Dr. Mach, contends that "relative indeterminism" is not inconsistent with the "principle of sufficient reason" and the law of causality derived from it; since a "free" cause satisfies the principle just as much as one that acts by necessity. Nor, on the other hand, does Dr. Mach omit all appeal to the "practical reason." The difference is that with Dr. Mach the appeal to the practical reason is subsidiary when it is not surreptitious, while with M. Fonsegrive it is the argument that is regarded as finally conclusive. Dr. Mach undertakes to prove the indeterminist position by positive psychological

arguments. M. Fonsegrive, in spite of an occasional inconsistency, such as the assumption that "absolute determinism" has been positively disproved, simply maintains that scientifically there is no absolute proof of determinism; that the metaphysical proof fails; that, consequently, since neither the thesis nor the antithesis is capable of proof on theoretical grounds, the practical reason must be called in to decide the antinomy in favour of free-will as an ethical postulate. The importance of this difference will become plain when the leading points of the history of the question have been briefly reviewed.

What M. Fonsegrive first of all brings out is that the whole controversy had its beginning in the efforts of the earliest humanistic thinkers to distinguish "that which depends on ourselves," τὸ ἐφ' ἡμῶν, from what depends on causes external to us. The speculative theory that was at first dominant both in Greek religion and philosophy was the conception of an external fate, beneath which man is powerless. The formation of the humanistic sciences required that this conception should be modified by a definition of the limits within which man has power, and of the nature of this power. The clear demarcation of that which depends on man was first achieved in Aristotle's definition of man's power over things as consisting in liberty of choice between equally possible alternatives. Man, according to Aristotle, not only has the power of choosing between the higher and the lower, but it is impossible to predict his choice; the future is really contingent. Aristotle, therefore, has a doctrine of free-will.

In interpreting Aristotle's formula, M. Fonsegrive makes clear, though without dwelling on the distinction, two aspects—the marking off of that which depends on man, and the ascription of a certain contingency to human action. Aristotle's doctrine, according to M. Fonsegrive's interpretation, which regards the "contingency of futures" affirmed by Aristotle as real, becomes a free-will doctrine in the modern sense. For the historical course of the free-will controversy has brought it about that indetermination of human actions has become identified in philosophy with free-will. If the

controversy had taken another course, however, the Aristotelian formula in its other aspect, as the distinction of that which depends on us from that which depends on things, might equally have been called a free-will doctrine. This may be shown historically from an incidental use of the term "free-will" that occurs at the beginning of the modern period.

When humanistic speculation of a scientific kind began again in modern times, it was found necessary, as it had been in antiquity, to distinguish the part of man in determining his own lot from the part of things. For if man is absolutely subject to a power external to himself, obviously humanistic speculation can have no practical bearing. This was seen by Machiavelli, who, in more than one passage of his writings, discusses the relations of that which in human affairs is in the power of man, and that which is in the power of "fortune." It is of special interest that in making this demarcation, as Aristotle had made it before, he ascribes that which is in the power of man to "free-will," and that, at the same time, although taking this term from the language of Scholastic philosophy, he uses it without any implication of indeterminism. The passage in which he thus makes use of the term "free-will" occurs in chapter xxv. of *The Prince*.

"It is not unknown to me," he begins, "that many have held and hold the opinion that the things of the world are in such wise governed of fortune and God that men by their prudence cannot correct them, nor have they any remedy thereto; and by this they might judge that it were good not to labour much in things, but to let themselves be governed by fate. This opinion has been more believed in our times through the great variation of the things that have been seen and are seen every day, out of all human conjecture. Thinking on which, sometimes I have in some part inclined to their opinion. Nevertheless, to the end that our free-will be not destroyed, I judge that it is true that fortune is the arbitress of half our actions, but that she yet leaves the other half, or little less, to be governed by us."

It will be observed that in this passage contingency, so far as it is implied at all, is referred rather to the part in human affairs that depends on external things than to the part that depends on us. This last, for anything that is implied so far, may be rigidly determined according to special laws of human

nature to be afterwards ascertained by those who cultivate the sciences of man. And it is remarkable that in Machiavelli's general political theory human nature is held to be the same in all ages and the characters of men invariable; so that individual men are successful because fortune is favourable to their particular character, and fail because they cannot modify their character, and consequently cannot change their modes of action, in accordance with changing events. The clearest empirical distinction, therefore, can be drawn between that which depends on things outside and that which depends on man without the assumption of the least indeterminism anywhere. For of course the contingency supposed in things by the reference of changing events to "fortune" need not be more than an apparent contingency, as indeed the contingency attributed by Aristotle to "that which depends on us" need not be more than apparent.

The "freedom," consisting in a certain relative independence of circumstances, that is attributed to man in Aristotle's formula is now seen to be separable from the notion of any real contingency. There is another sense of the term "freedom"—to which it has also been proposed to apply the term "free-will"—that has unquestionably been the possession of determinism from the beginning. No special historical evidence is needed to show how the distinction between the "freedom" and the "servitude" of the mind, between subjection to "passion" and the control of passion by "reason," has been insisted on, both in ancient and modern times, by determinist philosophers.

Indeterminists themselves define "moral freedom" as the state in which the struggle characteristic of free-will has disappeared. It is, indeed, regarded as a case of "free-will," but only because acts of free-will have been required to produce it. The clear view of the nature of complete freedom, in the sense of moral "autonomy," made Aristotle, and, as M. Fonsegrive points out, antiquity generally, regard the power of choosing between the lower and the higher, not absolutely as a perfection, but as the characteristic of an imperfect being that participates at once in reason and in the irrational

element in things. It is this act of choice between the lower and the higher, and not the degree of our "independence" of things, or the nature of moral autonomy, that has finally become the battle-ground of the opposing schools. The problem has come to be, Is there anything strictly indeterminate in the act of choice or deliberation? This definite shape has been assumed by it, as M. Fonsegrive shows, in the controversies of Scholastic philosophers and of Catholic and Protestant theologians. In modern philosophy, as in theology, it has continued to be associated with the question of man's moral responsibility before law, divine or human. Each school has been required to show that its own view of the act of choice is compatible with this.

When it is made clear that the real contingency of the voluntary decision is the essential part of the modern conception of free-will, the irrelevancy of many of the ordinary arguments for free-will in the sense of indeterminism becomes at once manifest. To show, for example, that in certain decisions of the will we are not constrained by an external power, or to point to the existence of "moral freedom," is to indicate a conception of freedom that is perfectly consistent with determinism. It must, on the other hand, be conceded that no assertion, from the determinist point of view, of freedom in either of these senses, can satisfy the indeterminist. Indeterminists feel that, as Dr. Mach points out, the doctrine of an "internal necessity" is just as much determinism as the doctrine of an "external necessity." What the indeterminist requires for the completion of his idea of freedom is that the act of choice should be free alike from external and from internal "necessity," not merely from constraint; and this "real contingency" of the act of choice is exactly what it is of the essence of determinism to exclude. For "the real contingency of the future" involves a break in the chain of causation, both psychological and physical. Here Dr. Mach does not quite face the real difficulty. When it becomes a question of proving that the decision of the will is not necessary, he urges that it is not constrained. M. Fonsegrive—and this is his special merit—relying, as has been

ON FREE-WILL.

said, on M. Renouvier's argument from the practical reason, has shown the bearing of indeterminism on causation with the utmost clearness. There is, no doubt, some ambiguity in his defence of free-will when he contends that the principle of sufficient reason is satisfied by "a free cause"; but, when he shows that by no scientific hypothesis can indeterminism be made consistent with absolutely uniform physical law, the ambiguity disappears. A consistent indeterminist is obliged to maintain that, with identical psychological conditions of a decision, the decision may vary without any new cause except a strictly "imprevisible" act of "free-will." Now this means, as M. Fonsegrive shows, that, since the decision is manifested externally, a certain portion of energy must be created or annihilated. Whatever may be the psychological meaning of a "free" as opposed to a "necessary" cause, it is admitted to be inconsistent in physics with belief in the conservation of energy as "an absolute law, without restriction." But, M. Fonsegrive proceeds, as a matter of fact, experience nowhere shows undeviating conformity to law. And to say that all falling short of absolute exactness is due to defects in accuracy of observation is a mere assumption. The slight apparent deviations of experience from uniformity may be in part the expression of real deviations. And if the world is governed by a will instead of by an impersonal fate, by a flexible "law of love" instead of by an inflexible "law of pure reason," then we should not expect to find the absolute uniformity that determinism requires. But there are moral grounds for affirming theism and the doctrine of free-will that is in logical harmony with it. Then, since experience by itself does not hinder the affirmation, the belief is philosophically justified. The claims of science are satisfied by the admission that the course of things is *approximately* uniform. And approximate, though not complete, uniformity is consistent with free-will. For the creations and annihilations of energy that are due to human free-will are in any case very small. Perhaps they in part balance one another. It is not a "relative indeterminism" such as this, but only an "absolute indeterminism," that contradicts science; just as, on the other hand, it is

not science but a certain type of metaphysics that requires "absolute determinism."

Before the logical character of M. Fonsegrive's argument can be appreciated, it must be cleared of some incidental positions that are either superfluous or inconsistent with the mode of proof adopted. One of these has already been indicated. M. Fonsegrive is not always willing to make the concession corresponding to that which he requires of determinists. He shows conclusively that, even if psychological determinists can explain by scientific hypotheses (such as Leibniz's "obscure perceptions") the acts of choice that seem most difficult of explanation, this does not prove determinism against objectors; since the scientific explanation takes for granted in the disputed case the uniformity that indeterminists deny. This being conceded, however, the indeterminist must admit in turn that he is leaving scientific ground altogether. If absolute determinism cannot be proved on scientific grounds, neither can it be proved scientifically that there are any residual phenomena of which no scientific explanation is possible. Psychological determinists have not, as a matter of fact, been baffled by the phenomena of deliberation; and in any case it would be more plausible to attribute difficulties to the imperfection of their science than to the "free causes" of indeterminism. M. Fonsegrive has only shown that experience does not compel the belief in absolute uniformity of law, not that absolute uniformity is disproved by experience. The argument, therefore, in which he concludes immediately from the untenableness of "absolute determinism" and of "absolute indeterminism" to the truth of "relative indeterminism" has no validity. Again, has any such belief as "absolute indeterminism"—which ought to mean that no inference from the past to the future is possible—ever been held? As believers in "absolute indeterminism" M. Fonsegrive classes Epicurus, Pelagius, Hume and M. Renouvier. Yet he himself, in the earlier part of his essay, has proved against M. Guyau that for the Epicureans there was at least no indetermination in the case of external things, but (after the first declination of the atoms) only in the case of man. And in

the interesting chapter on "English philosophy from Hobbes to our days," in which he shows the originality of the contribution made by English empiricism to the free-will controversy, he gives to Hume especially the credit of the "negative synthesis" that replaces both "free-will" and "necessity" by "invariable sequence." It is, however, rather the logical consequences of Hume's resolution of experience into isolated atoms of sensation that M. Fonsegrive has in view in classing him as an "absolute indeterminist" than his explicit doctrine as regards free-will; and with Hume he apparently classes M. Renouvier on the ground of his explicit indeterminism and his "phenomenism." Hume's phenomenism is, he holds, the only logical form of that mode of viewing the world which seeks an "extensive unity," as the pantheism of the Eleatics is the only logical form of the view which seeks a "comprehensive unity." Pantheism requires that there should be only one Being, including in itself all modes of being; phenomenism requires that there should be a multitude of perfectly isolated beings. Now the "pure Being" of Parmenides is the only metaphysical conception that can justify the assertion of absolute necessity; while Hume's psychical atoms, being absolutely independent of one other, suppose absolute indetermination. Here M. Fonsegrive's argument confounds the independence of individual beings with the contingency of their actions. The idea of independence is, however, as we have seen historically above, separable from the idea of contingency. And, logically, the actions of an independent atom may be conceived to be in themselves rigidly necessary. If any interaction of partially independent beings is supposed, this only makes the changes more complex, without destroying their necessity. As to the doctrine of Pelagius, whom also M. Fonsegrive places in the number of absolute indeterminists, its difference from the orthodox Catholic doctrine seems to consist not so much in the assertion of a greater amount of indetermination, of real contingency, as in the ascription to man of a greater natural disposition to good, or of a greater power over his own fate. So far as the mere indeterminism is concerned, St. Augustine,

according to M. Fonsegrive's interpretation, does not differ from Pelagius. While we seem to have found so far no indeterminism that is more than "relative," looked at in another way all indeterminism is "absolute." For although it may never have been held that in practice no inferences can be made from the past to the future, yet, according to the indeterminist view, the effect of a decision of free-will may make itself felt at any point of the series of phenomena; and so there is no point where a break is impossible. The choice, then, as M. Renouvier would say, is between determinism simply and indeterminism simply.

The exceptions that may be taken to parts of M. Fonsegrive's argument do not, however, affect his central contention, that there is logically a place for real contingency. A determinist need have no hesitation in admitting this. When acts of free-will are classed frankly with miraculous interruptions of a pre-ordained order that is maintained on the whole, and when prevision is at the same time allowed to be possible within scientific limits, it must be allowed that the whole conception of which these strictly "imprevisible" acts form part cannot be scientifically disproved. Even when he has transferred the question to theological ground, however, the indeterminist is not exempt from attack; for here there are the predestinarians to contend with. M. Fonsegrive, with his clear view of all that is involved in indeterminism, is only able to escape from the objection that free-will is incompatible with divine foreknowledge by refusing *a priori* to discuss it, by opposing to it what he calls "*une fin de non-recevoir*," on the ground that "the foreknowledge of God is incomprehensible," and so cannot be known to exclude human free-will. The only way of escaping this objection philosophically is to admit, with M. Renouvier, that the divine prescience is not absolute. That admission being made, the form of philosophical theism that includes the belief in free-will takes its place as a metaphysical doctrine, to be affirmed or denied on philosophical grounds. The ground on which M. Fonsegrive, following M. Renouvier, contends that it should be affirmed, is, as has been seen, that it is required by "the practical

reason." The belief in free-will is the only secure basis of moral responsibility.

So far as M. Fonsegrive aims at showing that the free-will question finally becomes one of metaphysics, his argument is perfectly cogent. The last step, however, the affirmation of a belief on the ground of the "practical reason," is open to dispute. One possible position, as I have ventured to urge, against M. Renouvier (see Correspondence in the Appendix, reprinted from the *Critique Philosophique*, Nouv. sér. An. iii.), is that, instead of the system involving free-will, the system involving absolute determinism ought to be affirmed, because it satisfies the desire for an intellectual ideal; this ideal, in theoretical philosophy, being alone relevant. To this contention M. Renouvier has replied that the moral ideal conflicts with what is held to be the intellectual ideal, and that, as this last is not forced on the mind, the logical position remains for the intellectualist one of scepticism, from which only the acceptance of the postulates of the practical reason offers a way of escape. Now it is interesting that, so far as the question of free-will is concerned, M. Fonsegrive, in a discussion of the determinism within the limits of science advocated by M. Ribot, to a certain extent anticipates the answer to this. M. Ribot's "relative determinism," as it may be called, is obviously, from M. Fonsegrive's point of view, the complement of the "relative indeterminism" on which he more especially dwells. He ought, logically, to admit that it is the only scientific position. For, on one side, free-will, as he defines it—that is, as having for one of its characters the theoretical impossibility of prevision even when all conditions, physical and psychological, are known—introduces an element of which science, psychological as well as physical, can take no account; and, on the other side, M. Ribot makes no dogmatic affirmation of absolute determinism. Yet this position does not satisfy M. Fonsegrive. He points out that, carefully as M. Ribot's scientific determinism is limited, it inevitably tends to pass beyond scientific limits. Now this, instead of being an argument *against* scientific determinism, is in reality an argument *for* metaphysical de-

terminism. What it proves is that even in the most severely restrained statement of the scientific position an ideal is already suggested to philosophy. This ideal, as M. Renouvier has shown, is not forced on the mind ; it is not completed by science : but, on the other hand, it is not arbitrary ; it is inevitably suggested.

And is it so certain that the ethical argument is in favour of indeterminism ? Determinists have often contended that it is really the denial of the necessity of human actions that would destroy moral responsibility ; and M. Fonsegrive admits that determinism supplies a basis of its own for the greater part of ethical, political and æsthetic theory. What he urges on behalf of indeterminism is that it gives a certain "accent" or a certain "grace" that would disappear with the destruction of the belief in free-will. Yet in a chapter in which he discourses of "the degrees of freedom" and of the progress from one stage of moral freedom to another by the exercise of free-will, he dwells especially on "moral gymnastics" ; pointing out, by way of illustration, with what psychological exactness "examples and occasions," as aids or hindrances of the moral life, have been set forth in Catholic manuals. Now does not all this minute attention to psychological conditions rest on the *determinist* part of the Catholic theory ? And in what way has the doctrine of an undetermined free-will tended here to rescue that spontaneity which, M. Fonsegrive elsewhere urges, is unrecognised by determinism ? In political theory, again, he holds that the doctrine of free-will gives a certain additional sacredness to personal rights. History at least, it may be objected, does not confirm the association of free-will doctrines with political freedom. As to the logical bearings of the opposed doctrines, M. Fonsegrive, in his chapters on "Consequences," seems occasionally to be forgetful of what he has himself made plain in the earlier part of the Essay. "The three characters of free action," he has said earlier, are "contingency, spontaneity and intelligence." He makes plain in his exposition, however, that the first character alone, and this in the sense of a real "ambiguity of contingent futures," is the distinguishing character of the indeterminist conception

of free-will. When, therefore, he sets forth the consequences of his total conception of "free action," this proves nothing in favour of indeterminism, at least against those determinist doctrines that equally recognise "spontaneity and intelligence" as characters of the higher kinds of activity. "The enemies of free-will," M. Fonsegrive says, are "habits and passions." But are these the enemies of strictly indeterminate action as such, and not rather of action that is at once rational and spontaneous in a sense compatible with determinism? If anything is to be proved in favour of the consequences of the indeterminist doctrine, the element of real indetermination ought to be detached from the others and its consequences viewed separately.

IDEALISM IN ENGLAND IN THE EIGHTEENTH CENTURY.¹

THE present contribution to the History of Philosophy—a branch of study which is now being cultivated with great success in France—not only has a special interest for English readers, but is in itself an excellent piece of work. Its purpose is to trace from the beginning the movement of English thought which in the eighteenth century culminated in the idealistic theory of the external world; the systems of individual thinkers being expounded only so far as they are phases of this movement. Accordingly, the author neither confines himself to English names nor to the greater names among Englishmen. For the origin of the idealistic movement in England, although there are prolegomena of “subjectivism” in Hobbes, has to be traced back to Descartes. Malebranche, again, had more influence in England than in France, and by him Cartesianism had already been developed in the idealistic direction. The first chapter, therefore, is devoted to Descartes, and one of considerable length to Malebranche. The idealistic theory, when it had been definitely put forth by Berkeley, first gained disciples in America; so that American names also have to be considered. And, of course, not the least important part of any continuous history of a philosophical movement must consist of expositions of the theories of minor thinkers. The author’s study of these has been so thorough that he gives a chapter to Richard

¹ *L’Idéalisme en Angleterre au XVIII^e Siècle.* Par GEORGES LYON, Ancien élève de l’Ecole normale supérieure, Professeur agrégé de philosophie au Lycée Henri IV., Docteur ès lettres. Paris: F. Alcan, 1888. Pp. 481.

Burthogge, and one to the American Samuel Johnson—names, it may be safely said, which are known to few English philosophical students. Adequate accounts are, of course, given of Norris and Collier. Taylor has a place in chapter v. as a representative “proselyte of Malebranche.” The last chapter is devoted to Hume, and has for its purpose to show how Berkeleyan idealism was continued by the “phenomenalism” of the great sceptic.

M. Lyon brings out very clearly the nature of the influence of Descartes in England. Descartes’ true philosophical successors in the eighteenth century, he contends, were Englishmen. In France, it was not the eighteenth but the seventeenth century that really deserved the name of “the philosophical century,” so far at least as the metaphysical and speculative part of philosophy is concerned. What was required in order that the idealism latent in Cartesianism should emerge was independent thinking from the Cartesian starting-point; and in England, where Descartes had from the first enthusiastic admirers but no strict disciples, the requisite degree of independence was found.

The relation for which M. Lyon contends between Descartes and the English philosophical movement that started with Locke may be taken as established. The author, however, underrates the importance of Locke in the movement. Locke, as he sees, misapprehended Descartes’ doctrine of innate ideas; and, as he acutely points out in discussing a criticism of Green (with whose Introductions to Hume he is well acquainted), the unsatisfactoriness of Locke’s utterances as regards the external world is due to confusion of thought on the philosophical question, and not at all, as Green says, to the external world being “the crux of empiricism.” Thus he is led to seek the origin of the clear philosophical theories of Berkeley and Hume elsewhere than in Locke. Berkeley, as well as Collier, he tries to derive from Malebranche, though he points out that Berkeley repudiated, while Collier acknowledged, the relationship. Again, he seeks to attach Hume not only to Berkeley, but directly to the Cartesian tradition. How near Malebranche came to idealism he shows in chapter iv.,

where he also dwells much on the interest of Malebranche's psychology; pointing to his affinities with Hume and Hartley, and in particular to his anticipation of contemporary "psychophysiology." He finds it surprising that an English disciple like Norris, who, as a Protestant, was not watched by the same suspicious orthodoxy, should have hesitated to draw the idealistic conclusion which Malebranche could only avoid by an appeal to Revelation. Berkeleianism, however, as M. Lyon himself constantly insists, is at the antipodes of Cartesianism in this respect, that it is "*an a posteriori metaphysics.*" The *a posteriori* character of Berkeley's thought, he remarks more than once, is not sufficiently recognised by Prof. Fraser; and he finds that even in the *Siris* there is no fundamental departure from Berkeley's first manner of thinking. Malebranche's doctrine, on the other hand, he describes as "a Cartesian Platonism"; and throughout the history of idealism he finds the antithesis of the Platonising and the experiential tendency; Malebranche and Hegel, in his view, representing the former, Berkeley and Mill the latter. Now is not the experiential character of Berkeley's philosophising as distinguished from that of Collier an evidence of his direct dependence on Locke, whose aim it was to oppose the *a priori* metaphysics of Descartes? Though Locke may have done nothing himself to educe the idealistic theory from the Cartesian "presuppositions," this does not detract from the importance of his experientialism as a basis for the typical form of English idealism.

An interesting episode of the book is the account of the fortunes of Immaterialism in America. Full expositions are given of the philosophical system of Dr. Samuel Johnson, "the first President of King's College in New York," and Berkeley's first and most faithful disciple, and of the immaterialism of Jonathan Edwards as it is found set forth in his posthumous work on the mind. The *petitio principii* of "common-sense philosophy," however, was soon to triumph in New England, whose University authorities naturally did not fail to become inspired with fear of the "dangerous" consequences of idealism. The discouragement of the Berke-

leian theory by the authorities met with no resistance, and American immaterialism came to an abrupt close.

A critic who agrees with M. Lyon in regarding the idealistic theory of the external world as definitively established by philosophy will find little to controvert in his positive conclusions. The distinction he draws between the two schools of idealism—the experiential and the Platonising school—is a sound distinction, and one that may easily be verified in contemporary English philosophy. With what he says as to the two forms of idealism not being so incompatible as might at first appear it is also possible to agree, though it may be doubted whether the reconciliation of them is likely to come, as M. Lyon suggests, from “a Hegelian.” The reconciliation that a Hegelian would be likely to attempt is one between “Transcendental Idealism” and the Realism of Common-sense.

M. Lyon’s book ought to find many readers in England. His work has the merits both of fulness of matter and attractive presentation. His accounts of minor thinkers are especially to be commended, as enabling the reader to form an independent judgment upon their various degrees of interest and originality. He has well understood the characteristics of the English philosophical spirit, though a failure of perfect apprehension may be detected here and there. When it is said, for example, that Hume, like Mill and all other English thinkers, claimed the right to speculate as boldly as he pleased without in any way menacing received opinions, this gives a somewhat false impression. It would be a better description of the attitude of Descartes than of Hume or Mill. The exact attitude of Hume, however, as M. Lyon very well shows, is difficult to define. Even native critics are not at one in their definitions of it.

PHYSICAL REALISM.¹

MR. CASE'S Essay, if it does not prove, as it is meant to do, that the whole of modern philosophy, with the exception of "natural philosophy" has been an aberration, is nevertheless a contribution to philosophical discussion from which much can be learnt. In the first place, the author gives a clear and correct view of the history of modern idealism. The Berkeleian theory of the external world, he shows, is the logical result of the development from Descartes through Locke, and the Cartesian starting-point, again, is that which was logically necessary after the development of the theory of the soul and of perception by ancient philosophy. The admissions implied in this view are not less important because the author holds them to constitute an argument that the starting-point of modern philosophy, so far as it was subjective, was wholly wrong. Nor is Mr. Case in detail so indiscriminating an opponent of idealism as might be inferred from his general position. If, in his view, we directly perceive a "physical" world, we do not directly perceive an "external" world. The appearance of externality in the object of immediate perception, according to the theory of "Physical Realism," is an illusion. To take up this position is, of course, to disclaim all appeal to the "evidence of consciousness" apart from scientific, if not also philosophical, interpretation. The name the author gives to his doctrine might, indeed, be expanded into "Realism on the basis of Physical Science" (and not merely

¹ *Physical Realism: Being an Analytical Philosophy from the Physical Objects of Science to the Physical Data of Sense.* By THOMAS CASE, M.A., Fellow and Senior Tutor, Corpus Christi College, &c. London: Longmans, Green & Co., 1888. Pp. 387.

realism as implied in scientific assumptions) ; the doctrine he opposes being defined correspondingly as "Idealism on the basis of Psychology" : though, having once admitted the relevance of physiology, for example, to the question of perception, he does not find it possible entirely to exclude psychological considerations. The second great merit of his treatment, after the historical view, is the definiteness with which he puts the philosophical question whether physical science with its "intelligible world" of invisible corpuscles and vibrations can be rationally explained by a doctrine for which the "being" of external things is simply "being perceived."

The author, like his realistic predecessors of the common-sense school, finds the origin of modern idealism in a single questionable assumption of Descartes, namely, that we perceive immediately "ideas" which are produced by the action of the object on the soul, and that we only mediate infer the object. Once accept this theory of "ideas," and there is no logical escape from absolute idealism. "If all the data of a man's knowledge were his soul and ideas, he could know nothing but other souls and ideas." Yet the common-sense school was wrong in maintaining that what we perceive immediately is the external object. The object we immediately perceive is "physical" but "internal." It is some part of the nervous system as affected by modifications produced from without. That which is perceived being physical and not psychical, it is allowable to infer other physical, and not merely psychical, objects from the object immediately perceived. From the modifications of the nervous system we infer their external causes ; and in ordinary perception inferences are so conjoined with direct perceptions that the illusory appearance arises of a direct perception of external objects. This doctrine of perception to which we have to return in order to escape from idealism is that of the ancient Atomists. The Atomists did not, indeed, present their doctrine in a quite unexceptionable manner, and of course it had scientific imperfections ; they supposed external things, for example, to act on the organs of hearing, sight, and temperature by emissions instead of by vibrations ; but they had hold of the essential truths that the

"immediate object" is "not the thing at a distance, but the result of the thing on the organs of sense," and that, "though internal and representative," it "is neither immaterial nor psychical: it is a physical object." The atomistic doctrine of perception is realistic, but not necessarily materialistic, and is compatible with "theological," though not with "psychological" idealism. Matter may have an existence that is not spiritual, and may yet have been created by a spirit. For the theory of perception, the defect of materialism is neglect of "the latent factor in all thinking, the soul." "The thinking subject is man, thinking partly by his body, that is, his nervous cerebral system, and partly by a latent factor, his soul, co-operating, as by the composition of forces, in every operation."

At the ground of this theory of perception there is a psychologically justifiable conviction of the special intimacy of the consciousness of the body. As a proof that "the body is a patent factor of the thinking subject," the author urges, for example, the facts of organic sensation. These facts, however, are not sufficient to support his theory. When it is considered that the data of sense that we assign to the body are just as capable of psychological expression as those that we assign to the external world, the whole argument in favour of realism from the knowledge we have of the body loses its force. But let us examine the atomistic doctrine more directly. According to the author, we see "the extended in the optic nerves," we feel "the extended in the tactile nerves" (p. 250). "The hot felt is the tactile nerves heated, the white seen is the optic nerves so coloured" (p. 24). "It is true that red refuses to appear to our senses as a motion representing the external motion which produces it. But the cause of this fact is to be found in the construction of the optic nerve, which, when acted on by a certain imperceptible motion of ether, receives a sensible colour apparently unlike motion, just as oxygen and hydrogen in certain proportions, when acted on by electricity, become water. In the same way, when a wheel rotates too quickly, the sensible effect ceases to be a motion, because the nerves are insusceptible of taking on so rapid a motion in

sense. The sensible effect is similar or dissimilar to the external object, so far as the nervous system is capable or incapable of being affected similarly to the external object" (p. 31). The meaning of these assertions, if we are to retain the atomistic theory, must be that when we perceive clearly the motion of the corpuscles of the nervous substance, we have a perception of extension or motion, but that when the vibrations impressed on it by the ether are such that we can only perceive them confusedly, then the confused perception of the vibrations is what we call a perception of a heated or coloured surface. Now the mere consideration that a sensation of colour or heat, whatever may be its cause, is psychologically *sui generis*, shows at once the inadequacy of atomism, by itself, to explain a perception involving heat or colour as one of its sensational elements. With the beginning of psychological consideration the "idea" or "phantasm," in its distinction from configurations and vibrations of material particles, in some form returns. Even in Mr. Case's own theory it returns in a vague form when he says that man is partly "psychical," and more clearly when he says that "the hot felt and the white seen . . . are apprehended by internal sensations of touch and vision" (p. 25). For of course the distinction, made immediately afterwards, of the sensation from its object does not take away the effect of the admission of an internal psychical process. And these are not admissions that are compelled by the author's "theological idealism" and that would disappear from a more consequent "atomism." In his theory of perception, Mr. Case is as consequent an atomist as it is possible to be. Any admissions he makes are extorted from him by the facts. Now it is his own contention that if the "psychical" apparition of the Cartesian or Lockian idea is once permitted to enter, sooner or later the conclusions of Berkeley and Hume must logically follow. The "primary" qualities of matter, under the Berkeleian analysis, go the way of the "secondary" qualities.

Idealism, however, when formulated as a philosophical doctrine, has to interpret scientific knowledge as well as ordinary perception. Whatever may be its plausibility from

the subjective side, the proof that it cannot do this would be, Mr. Case contends, a *reductio ad absurdum*. It is this *reductio ad absurdum* that he undertakes to give. "Man as a natural philosopher," he says, "knows things in themselves which are not phenomena, when he knows imperceptible particles." The assertions of physicists, that atoms have a real and not merely a hypothetical existence, are, for philosophical idealism, meaningless. But the accepted results of physical science have a higher degree of certainty than any conclusions that can be drawn from the mere subjective data of psychology. The psychological method in philosophy, therefore, since that leads to idealism, is in need of revision.

Mr. Case, however, has himself tried to make this revision; and, as we have seen, the attempt only brings him back to a point where the precise assumptions that have led historically (and, as he admits, logically) to idealism force themselves again upon the thinker. It is clear that a solution of the difficulty is not to be found in accepting the scientific view, any more than the ordinary unscientific view of the object of perception without an examination of it in the light of philosophical theory. Such an examination would remove the difficulty put by Mr. Case. The assertion that atoms are not merely assumed hypothetically in order to facilitate calculation, but have a real physical existence, would be found to mean, philosophically, that the atom is an object of possible though not of actual perception; that under certain conditions, ultimately definable in psychological terms, we should detect certain small, hard bodies having some kind of vibratory motion, which our present sense-organs and microscopes do not enable us to perceive. This, again, means that certain sensations and ideas would follow one another in a certain connexion. What the realist has to show in order to prove his position is that "scientific objects" cannot be wholly resolved into "possible phenomena." Mr. Case, as he tells us (p. 380), has written a chapter, which is in print, to show this at length. When it is published, we shall be able to judge how far he has been more successful than other realists.¹

¹ In a note on "The Philosophic Term Phenomenon," published in

In detail, Mr. Case objects against the procedure of English philosophers, that in psychology they make realistic assumptions that are inconsistent with their idealism. This objection is, of course, answered by the distinction that is clearly drawn in recent, though not in earlier, experiential philosophy between psychology (as pure science) and theory of knowledge. As urged by Mr. Case, it does not indicate any leaning to Neo-Kantianism. His chapters on Locke and Kant have a decidedly experiential tendency.

So far, we have not found that Mr. Case establishes anything against the idealistic position. Yet it must be conceded in the end that his arguments do really indicate a weakness of idealism as it is sometimes presented. As expounded by Mill, for instance, in the *Examination of Hamilton*, it is a theory of knowledge with a psychological basis, and nothing more. But when the objects of perception and the objects of science have all been resolved into phenomena, actual or possible, philosophy has further questions to ask. Now science, when it is viewed apart from idealistic theory of knowledge, appears to have answers to give to some of the further questions of philosophy; while philosophy, by stopping short at theory of knowledge as existing in the individual or even in the social mind, appears to destroy rather than to interpret the answers of science. In this state of things, a not unusual combination of positions is to admit the force of the idealistic argument, to go on effectively thinking of the objects of science as existing independently of all minds and producing them, and, controversially, to avoid all difficulties by a confession of agnosticism. Mr. Case is, as he says of Berkeley, "too philosophical to be an agnostic"; but he does not see that only philosophy, and not special science by itself, can answer questions as to the nature of reality; that, in short, it is only from the philosophical point of view that an ontology is attainable. To become ontology, philosophy must go beyond the theory of our knowledge of phenomena; but the example of Berkeley proves that

Mind, xiv. 309, simultaneously with the present review, Mr. Case seemed to me to make out only this: that in the use of the term "phenomenon" by men of science as equivalent to fact, idealism is not necessarily implied.

there is nothing inconsistent with English philosophical method in the attempt to answer ontological questions. Hume's Scepticism and Kant's Criticism have, indeed, made it impossible to continue affirming ontological propositions in the old "dogmatic" manner; but they have not made ontology itself impossible. Hegelianism, for example, whether in its original or in its renewed form, if it is to be rejected, must be rejected not simply because it is "ontological," or on account of its consequences, but because, as a philosophy, it is wrong in method or in principle. Now that the Hegelian philosophy no longer gives satisfaction even to its own adherents, it remains for a philosophy that is psychological in method and experiential in principle to prove its confidence in itself by going back to the perennial questions of ontology. This is the moral of Mr. Case's book.

REALITY AS PHENOMENON.¹

MANY attempts have been made to revive the Leibnizian doctrine of monads, and perhaps this is the theory of the ultimate nature of things that is now most in favour with metaphysicians. Its obvious defect in its best-known forms—such as the metaphysics of Lotze—is that it does not take sufficient account of the modern criticism of the notion of substance, but postulates the existence of a substantial soul as the substratum of phenomena. Prof. Gourd's book is remarkable as an attempt to furnish the basis for a new monadism that shall be consistent with "phenomenism" in its application to the notion of mental as well as of material substance. In his present volume he does not work out his metaphysical doctrine itself; but he aims at showing that the doctrine of a plurality of monads is not only consistent with the rejection of all "ultra-phenomenal substances," but that the analysis of experience on phenomenist principles points to this as the solution of the metaphysical problem. There is room within experience, he contends, for the conception of substance as persisting fact; and the facts that persist, it may be shown, are "separate" facts, facts divided from one another by impassable "limits." From this result he concludes to atomism in physics and monadism in metaphysics.

"General philosophy" as defined by Prof. Gourd does not very much differ from what is ordinarily called "theory of knowledge." Its object is the "ultimate diversities" of

¹ *Le Phénomène. Esquisse de Philosophie générale.* Par J. J. GOURD, Professeur à l'Université de Genève. Paris: F. Alcan, 1888. Pp. 447.

experience. These ultimate diversities, in the author's view, are all reducible to the "supreme abstract," consciousness. For science they are principles of explanation. For "general philosophy" the principle of explanation is consciousness, to which they are reducible. They all consist of "dualities," or pairs of opposed terms. Of these there are three that are irreducible except to the "supreme abstract." The names the author gives to them are—"the aspects of the phenomenon," "the moments of the phenomenon," and "the facts of the phenomenon." The duality of aspects is the opposition of "resemblance" and "difference"; the duality of moments is the opposition of the "physical" and "psychical" orders of phenomena; the duality of facts is the opposition of "being" and "not being." With the first diversity are connected other diversities reducible to it, the relations of which are traced out by the author with much subtle analysis. On the side of resemblance he places the "scientific" and the "causal"; on the side of difference the "non-scientific" and the "non-causal"; the point that he especially enforces being that there are differences among the particulars of experience that escape the grasp of scientific laws. "Resemblance" and "difference" universally coexist; but while there is no resemblance without difference, and no difference without resemblance, each may be present to any degree, from a minimum to a maximum. Acts of "free-will," since they involve the "non-causal" and strictly "new," are not objects of science; but they exist among the differing elements of experience. The terms of the second diversity, being mutually exclusive, cannot be called "aspects" like resemblance and difference. Neither can they be called "facts"; for the reality remains the same whether it is "physical" or "psychical." The best name for them is "moments," used not in the strictly "chronological" but in an analogous sense. Within the psychical moment there is the diversity of the "affective" and "intellectual" moments; within the physical moment, the diversity of "matter" and "change," or, more exactly, "form." The affective and material moments are "non-relational"; the intellectual and formal moments

"relational." Relation is at its minimum in the affective moment, at its maximum in the explanations of physical science. When it is said that the diversity of "facts" of consciousness is that of "being" and "not-being," it is not meant that "not-being" is itself a fact, but that it is the "negative," as "being" is the "positive," "element of fact." That is to say, there exist "separate realities," "closed-off totals"; being is not absolutely continuous. There is "separation," "limit," "interval"; and the name for this is "not-being." It is at this point that the author finds the rejection of pantheism and the acceptance of monadism in the psychical and of atomism in the physical world to be necessitated. Evolution, to which he refers at the end of his study of "the facts of the phenomenon," he does not reject; but he finds that the question of the first origin of "groups" is scientifically insoluble. The theory of evolution merely sets forth the continuity and resemblance that exist; and the real history of groups includes more than continuity and resemblance. There are differences among realities—whether inorganic things, individual organisms or species of organisms—that are finally inexplicable, that is, remain for ever "true inconvertible differences."

Prof. Gourd's doctrine is, as he claims on its behalf, a consistent phenomenism. Some doubt might seem to be thrown on this by his use of the term "dualism" to describe his own position; but the term refers to the "dual opposition" or "diversity" of the "moments" of experience, and not to a diversity between the substances of matter and mind. If a "physical" is distinguished from a "psychical" moment, there is no real ambiguity; for the physical moment, in Prof. Gourd's definition, is no more "extra-conscious" than the psychical moment. By "fact" or "phenomenon" he always means a fact of conscious experience; and the notion of the externality of the physical world to consciousness is described as arising by a "projection," having a certain illusory character till it is brought under philosophical analysis, of elements that are simply elements of consciousness.

In the preparation that is made for a constructive meta-

physics, there is to be noted the constant effort to find a meaning within experience for such terms as "absolute," "infinite," "being," "substance," and others that it has been too easily supposed must be expelled from a scientific and critical philosophy. Prof. Gourd's discussions of these terms, whether they are conclusive or not, will always repay study. In metaphysics he finds that there is inevitably a "projection" beyond experience, not necessarily illusory, but never perfectly verifiable. It is in not being perfectly verifiable that metaphysics differs from science. The condition that is to be laid down for every metaphysical construction is that its materials must be such as are found within experience. When, for example, we assert the existence of other individualities besides our own, we are simply asserting the existence of other series of conscious states, and not of something that is foreign to all consciousness, as when the older conceptions of substance were used. A metaphysical explanation of things may proceed further in this kind of construction; but it must not work with such conceptions as those of unknowable substrata of phenomena. Nor must it attempt to explain the world as simply a network of relations, in the manner of the Hegelian Rationalism. The "affective" and "material," as well as the "intellectual" and "formal" elements in experience, must be taken account of by metaphysics.

The value of much of this teaching may be recognised independently of acceptance or rejection of the author's positive metaphysical doctrine; but after all it is the metaphysical conclusions indicated that give their strongest interest to all discussions of "theory of knowledge"; and a notice of Prof. Gourd's book would be too incomplete if nothing were said as to the bearing of the analyses of his "general philosophy" on his monadism. Does mere analysis of experience, by bringing to light "ultimate diversities," compel the rejection of pantheism, that is, of the systems for which individual things are determinations of the whole, and the acceptance of monadism, or the doctrine of a plurality of absolutely separate real existences? This is the question that will finally present itself to those who have followed Prof. Gourd's analysis of

thought. Now, his argument against pantheism is summed up in the remark that all pantheistic systems make the diversities of the universe arise *ex nihilo*. He himself (in his indeterminism, for example, as he acknowledges) admits creation *ex nihilo*; but, of course, this does not make the argument against pantheism any weaker; and if a monadist, rejecting creation, were to affirm the pre-existence of all monads from eternity, then his position would seem to be exempt from any counter-attack based on philosophical objections to the idea of creation in general. A pantheistic explanation of things, nevertheless, remains possible even in face of this more thoroughgoing monadism. For the "differing elements" that are arrived at by analysis are not themselves separate individual things. Differences between individual things remain for monadism, as well as for pantheism, something to be explained, at least by their reduction to differences between elements. Since the differing elements that have been arrived at are simply "abstracts," it is not to be inferred from their being known apart that they really exist apart. Thus it seems open to any one to hold as a metaphysical hypothesis, in opposition to the doctrine of a plurality of separate substances, the position that the term "substance" is properly applicable only to the whole of existence. Consistently with this position it may be held that diversities have pre-existed eternally; the differences among individual things being conceived as arising by segregation of elements. That this hypothesis is sustainable is not, of course, sufficient to establish pantheism; but, at least, it may be taken as proof that the philosophical analysis of experience does not compel its rejection.

THOUGHT AND LIFE.¹

IN former writings, several of which have been noticed in *Mind*, Prof. Eucken has put forward some distinctive views on the historical movement of philosophy in the past and on the currents of philosophic thought that are most powerful in the present. Hitherto his historical ideas have only found incidental expression in the separate treatment of particular thinkers. His view of present philosophical opinion has been developed independently in *Die Einheit des Geisteslebens in Bewusstsein und That der Menschheit* (see *Mind*, xiii. 461). Referring readers to that work for a more detailed examination of philosophical thought in its bearing on life at the present day, he now gives a supplement to it in the form of a connected series of studies of the views of life that have received philosophical embodiment at the hands of the great thinkers who seem to him best to represent (or in so far as they seem to him to represent) their own ages. The result is that his view of present philosophy gains in concrete interest and that his historical theorising conveys a more distinct total impression.

Prof. Eucken's work might be called a history of European ideals with a view to the determination of the ideal for the present time. Setting out from the "national Greek" view of life, he begins with an account of the philosophies of Plato and Aristotle; Aristotle being, in his view, the most consistent

¹ *Die Lebensanschauungen der grossen Denker. Eine Entwicklungsgeschichte des Lebensproblems der Menschheit von Plato bis zur Gegenwart.* Von RUDOLF EUCKEN, Professor in Jena. Leipzig: Veit & Co., 1890. Pp. viii., 496.

interpreter of the purely Greek spirit, and Plato, though not so wholly Greek as Aristotle, still in important respects a typical representative of earlier as distinguished from later antiquity. Here is found already the problem of reconciling the claims of personal and impersonal being, which remains central all through the development. Is human life, considered theoretically, simply a phase of non-personal being, or has it a relation to a transcendent personality? Ought it to be subordinated practically to an external process, or to be lived in accordance with an inward ideal? It is only later that these questions will be definitely put; but they are already seeking formulation. In the period of Greek freedom they had found a provisional answer in a view which, while tending to subordinate the individual man to an impersonal universe in the theoretical relation, and in the practical relation to a State that claimed to control his whole life in its own interests, yet did not entirely suppress personality. For the universe was then nearer to man through the absence of the trenchant modern distinction between mind and nature; and the individual Greek citizen spontaneously found satisfaction in the personal development made possible by the life of the city. "What for us moderns lies as an ultimate aim at a distance out of sight, is here boldly and largely grasped by the thinker in an anticipatory solution." When Greek freedom is lost, and at the same time the non-Hellenic world comes more into view, "man is thrown from possession into search." The problem, which now presents itself, of an individual life to be lived without aid from spontaneously harmonious relations to natural and political surroundings, is solved in different fashions by the philosophic schools of later antiquity. The Stoics raise the specifically ethical problem to independence. The Neo-Platonists arrive at a properly religious conception, and place the ideal wholly in an inward life. The Neo-Platonist "inwardness," however, remains strongly tinged by the "intellectualism" of antiquity. God and man are conceived under the form of intelligence more than of moral personality. In the meantime Christianity has appeared, with its promise of giving full satisfaction to the demand for a new

ideal of personal life by bringing man, conceived as essentially a moral personality, into relation with God, conceived as the transcendent moral and personal cause of all things. The entrance of Christianity is thus "the greatest act of emancipation in the history of the world." That the character of an emancipation was so soon lost is to be explained by the internal decay of the ancient world, which had no longer the vigour to respond to the impulse towards a renewed moral life, but by the weight of its political organisation and the rigid intellectual form of its philosophies imposed on Christian life the dogmas and discipline of the Catholic Church. During the mediæval period the inward life was preserved by the mystics, and at the Reformation the time had at length come for a successful effort to revive the ideal of moral personality in its earlier Christian form and not under the Catholic form of a synthesis of Christian with Greek and Roman elements. Much, however, still remains to be done. The Reformers did not get so near as they thought to primitive Christianity; and the restoration of the intellectualism of antiquity, proceeding from the Renaissance and resulting in the more thoroughgoing modern intellectualism, has necessitated a new effort at reconciliation of opposite theoretical views and practical ideals. Such a reconciliation, Prof. Eucken suggests, may be found in the affirmation of an "inward and spiritual" miracle, together with the rejection of "physical" miracle. That revival of the life at once of Christianity and of classical antiquity which constitutes the deeper basis of the new world has now, however, to contend with the specifically and narrowly "modern" ideal of "dynamism," or the putting forth of the greatest possible activity in the movement of civilisation. From the two opposite philosophical points of view of "Naturalism" and "Intellectualism" (in a more special sense), the whole movement of things (human life included) is regarded either as a purely natural process or as a logical process of a cosmical reason. The individual thus comes to be thought of as having his reality and his true life as a mere link in an external process which, whether rational or only natural, is in either case impersonal. "Intellectualism" and

"Naturalism," however, are in their application to the detail of life in irreconcilable opposition; and the elements of civilisation derived from classical culture and from Christianity, opposed as they are equally to the ideal of mere "expenditure of force," are, after all, the most genuinely modern. When confronted with Kant's doctrine of the moral personality of man—the most distinctively Christian of modern philosophical doctrines and the highest point reached by modern philosophy—the "dynamical" ideal of life breaks up. For a time like the present, with its conflicting tendencies, that ideal is, indeed, least of all adapted. The problem before us is one of selection and reconciliation of beliefs. In the final reconciliation, the convictions required by the moral personality must take the lead. An essential requirement for the personal moral ideal is dependence on a transcendent personality. The reconciliation of the classical and modern ideals with the Christian ideal must consist, therefore, in the carrying on of intellectual life and of the practical work of civilisation under the dominance of the personal religious life. This, in accordance with the principle of Protestantism, must be free, not constrained under a uniform external system.

The parts of Prof. Eucken's historical sketch that are likely to meet with acceptance or rejection according to the individual point of view of the reader being left aside, a brief criticism may here be made on what seems a fundamental inconsistency, or at least unreconciled juxtaposition, of views. Catholicism, Prof. Eucken holds, is entirely the result of a "synthesis" of classical and Christian elements, not at all of a subjugation of the classical world by a new force from without. Among the philosophies that contributed to the formation of the Catholic system, Neo-Platonism appears to him exceptionally important: so much so that he interposes his account of Plotinus between accounts of the older Christian Fathers and of Augustine, and dismisses the later Neo-Platonists as of no significance, because non-Christian. Plotinus, we are told, destroyed what he wished to preserve—that is, the ancient world of thought, and promoted what he

wished to destroy—that is, Christianity. The “fixation,” the “standstill,” of the ecclesiastical system is explained as the last result of ancient ideas, and the system itself as their legitimate outcome; and the “life-weariness” that made the ancient world, instead of carrying Christianity forward, compel it into rigid limits, is found to have arrived at the extreme in the Neo-Platonists. Yet, after all this, Prof. Eucken insists, not only that it was from Neo-Platonist writings that the mystics of the Middle Age drew the inspiration by which they kept up the “internal life of feeling,” but also that emancipation from the mediæval system of thought at the Renaissance was attained in the philosophical field above all by a return to Neo-Platonism as a new starting-point.

At once the most distinctive and the most noteworthy point of Prof. Eucken's book, as of its immediate predecessor, is his opposition to modern “dynamism”—which, at the same time, he describes not unsympathetically. Probably no one has better portrayed that materialistic mysticism of the “gospel of work” with which we are all familiar. Its power to ally itself with either of two opposing systems of theoretical philosophy, and thus to take on the illusory appearance of a philosophy of life, is well shown; though, perhaps, Prof. Eucken looks upon it rather as the outcome of those systems than as a mood that attaches itself to them. In any case he brings forward good reasons for holding that it is only superficially modern. The subjectivity of modern philosophy must of itself prevent us from finding any permanent solution of the problems of life in action prior to theoretical insight or personal conviction.

That the “intellectualism” (in the more general sense) of modern philosophy is destined to take the subordinate place assigned to it in the determination of belief is not at all so certain. It is remarkable that Prof. Eucken himself makes the interesting concession that Kant's exclusive “moralism” has caused him, in theoretical philosophy, to fall short of the great thinkers of the seventeenth century, and that here, though not elsewhere, the nineteenth century has gone beyond

him. Prof. Eucken's own reconciliation of the demands of intellect and of the moral personality by the admission of the miraculous in the realm of mind but not of nature does not seem very hopeful. In his present work it is only suggested. If it were developed, there are obvious difficulties that it would have to meet which are not touched upon.

THE LAWS OF IMITATION.¹

THE characteristic that first strikes the reader of M. Tarde's book is its geniality and brilliancy in detail. With all this brilliancy it is, at the same time, the clear presentation of a definite main thesis to serve as the foundation of a scientific sociology. Earlier writers, as M. Tarde points out, have often been struck with the social importance of the phenomena of imitation; but no one has hitherto sought to constitute the whole science of sociology by generalising those phenomena. What has hitherto chiefly been attempted is rather to bring the facts of society under some physical or biological formula. A purely social expression of the facts has been thought not to be scientific enough. It is true that sociology is based on physics and biology; for society involves physical and vital as well as purely social facts. The definite constitution of sociology as a separate science requires, however, that there should be some kind of uniformity that is distinctively social, and which cannot be fully expressed in biological or physical terms. This uniformity M. Tarde finds in "imitation." All scientific laws are cases of "universal repetition." The social form of repetition is imitation, as its physical form—to name the most conspicuous—is vibration, and its vital form generation. Imitation is here a psychological term, being the name for the uniformity displayed by minds in society. "Pure sociology," or sociology

¹ *Les Lois de l'Imitation. Étude Sociologique.* Par G. TARDE. Paris: F. Alcan, 1890. Pp. viii., 432.

as far as it is not based on the generalisations already attained by physicists and biologists, is concerned exclusively with this mental uniformity. Within the individual mind a new idea raises up likenesses of itself, and tends to assimilate the ideas with which it has come into relation. So, when men dwell together in society, an invention or discovery, a new mode of thinking or feeling, arising in one mind is "imitated" in other minds, and, as its last result, gives origin to actions having all a certain resemblance because they have their spring in similar desires and beliefs.

"Imitation" thus gives to social phenomena that element of generality without which no science can exist; but the facts of society are not wholly constituted by this generality. What is imitated is in the end always some idea or feeling that arises in an individual mind. The whole movement of society depends finally on the initiative of individuals. From point to point of the series of inventions and discoveries made in the course of history, certain relations of dependence may be detected. It can often be shown that particular discoveries and inventions must have preceded others. There is consequently a place for speculation as to the order of the individual causes of social progress. Such speculations constitute the "philosophy" of society or of history. By the "science" of society the individual causes in their actual grouping must be taken as original collocations, which it is not its business to go beyond. They have a certain "discontinuous" and, so to speak, accidental character, which must always withdraw them from complete scientific explanation. All the sciences that are concerned with given facts, and not merely sociology, have to assume empirical data of this kind. Individuality, in some sense, is at the root of all real existence.

Every kind of intellectual or moral assimilation of the beliefs or desires of other persons being called "imitation," and every new mode of thinking or feeling an "invention," the aim of social science may be defined as the ascertainment of the laws of the imitative propagation of inventions. Socially, as the author puts it, all is invention and imitation. Resemblances between the members of different societies,

when they are not due to imitation are due either to the common pressure of similar circumstances and needs or to heredity. They are therefore rightly called "natural," as not being distinctively human or social.

In the application of his general conception M. Tarde makes considerable advances towards the establishment of definite laws of the social transmission of ideas. His distinction between the "logical" and "extra-logical" factors of social development, for example, of itself clears away a good deal of obstruction from the unprepossessed study of society; and his positive laws of the action of the two kinds of causes are far-reaching and generalised from large masses of facts. These laws will be the main subject of what follows; but first M. Tarde's definition of the "social group" must be stated, together with an important deduction from it.

The social group is defined as a collection of beings that imitate one another or that have been brought to resemble one another by imitation of the same model. This definition M. Tarde opposes to the definition of a society as consisting in a union of beings for mutual economical aid. In support of it, he puts various cases of actual societies, and asks whether there is the most genuine "society" between those persons who most resemble one another or between those who have most economical need of one another. Evidently the truest society is between those who resemble one another mentally, though they may be rivals, and not between those who, needing one another economically, have no mental resemblance. Such resemblance as is required to constitute a genuine society can only be produced by some form of "imitation"—such as common education or common traditions. Hence a judicial definition of society would be better than an economical definition. For the "mutual determination of engagements or consents, of rights and duties" depends on a certain degree of mental resemblance, and arises only among those who recognise their similarity to one another; while economical relations are rather an expression of the constraint exercised by external circumstances, than of the genuinely social impulse, and can exist without the resemblance due to imitation. Far from

denoting an advanced state of civilisation, the tendency to subordinate the consideration of rights to that of services loses its force in proportion as humanity improves. Society in the sense of "social organisation" certainly involves economical aid; but in the sense of "sociality" it does not. Sociality, or the purely social element in society, is free individual impulse, propagating itself by spontaneous imitation. As the social comes more and more to dominate the vital and the physical, purely social relations will gain more control over economical relations. Discussing, further on, the description given of "our contemporary epoch" as one of "science and industry," M. Tarde remarks that to describe it thus is to say that it is occupied with means rather than with ends. Though philosophy has not been wholly neglected, special science has advanced more rapidly than the philosophy of science; and there is a far greater disproportion between the accumulation of industrial means and their employment for the ends of civilisation. A not very distant age may see the subordination of industry to æsthetic and ethical ideas.

So far as the imitative propagation of inventions and discoveries is due to social as distinguished from physical and vital causes, its causes are in part logical and in part extra-logical. Of the innovations suggested by individual minds, some are taken up and imitated in preference to others because they are found truer or more useful. Their propagation is thus "logical or teleological." The way in which logical or teleological imitation proceeds is this. At the earliest stage of social development there is coexistence of all inventions in all kinds without any consciousness of mutual incompatibility. Progress takes place by "accumulation." As inventions continue to accumulate, contradictions declare themselves. There is now a series of dialectical struggles, each of which ends in the victory of one of two opposing ideas or in the supersession of both by a third. First the contradiction is perceived by individual minds. When the phase of mental hesitation has passed, and each person has decided for one idea or the other, the struggle becomes a social struggle between two parties

or sections. Progress now takes place by "substitution," peaceful or violent, of a conquering for a defeated idea. This in turn does not go on indefinitely. By a process of elimination a system of principles is at length left behind, within which all later inventions take their places in order. Thus there is once more progress by accumulation; but the ideas accumulated, instead of merely not contradicting one another, now support one another. All this, of course, goes on in a series of rhythms, not in three continuous stages extending over the whole of human history. Take, as an example, the growth of a language. At first every new name or grammatical form is a new acquisition, and all can coexist. In time the grammatical forms evolved begin to come into collision. Some are now selected and some thrown out, till at length the grammar of the language has become fixed. Beyond this point, the vocabulary can again increase, and even more rapidly than at first, a place being ready for every new word on condition that it conforms to certain rules; but there is no more advance in fundamentals. So it is not merely with language, but with every social institution and with every science and art. The term of all logical conflict is pacification and unity, a common faith in a common ideal.

Imitation under extra-logical influences also takes place according to assignable laws. Its movement is always from within outwards, and from the superior, whether person, locality, or class, to the inferior. Further, in any given society imitation either follows by preference the example of ancestors, or by preference takes up innovations, especially those initiated outside the particular social group. That is to say, it assumes the form either of "custom" or of "fashion." By the law of movement from within outwards is meant that belief determines action, and not action belief. Beliefs and desires, not their external expressions, are the substance and force of what is imitated. Imitation of externals is the result of a desire to resemble internally the models that are followed. In the statement of the second law we are to understand by "superior" the recognised superior. Although there is a certain reaction from the inferior to the superior, imitation

always spreads from the social summits. And when old inequalities disappear new ones appear ; so that there are always points from which imitation can proceed. At the present time, indeed, it proceeds more rapidly than ever. The recognised superiors at any particular time are those who show themselves most able to understand the discoveries and to take advantage of the inventions already made. The third law of extra-logical imitation does not apply, as the two first do, to all the imitations within any society (the logical motives being supposed equal). Custom, or imitation of ancestral examples, always preponderates over "fashion" on the whole ; but there is a certain range for variation, and within this range, according to the society or period, either of the two forms may rule. In all societies imitation takes the form of custom before it takes that of fashion. A social group need not pass from the first stage to the second ; but wherever there is transition the order of succession is invariable. Fashion is uniform and unstable ; custom is multiform and stable. During the Middle Ages, for example, when (in everything but some main points, such as religion) custom ruled throughout Europe, the particular usages varied from country to country and from province to province. On the other hand, they were fixed in time. Precisely the same usages might be found at the same spot after the lapse of a century. In an age of fashion, such as the present, the usages, in those departments of life, for example, to which "the great industry" appeals, are the same all over Europe at the same moment. Ten years later they have changed, but are equally uniform. Will this instability continue for ever ? M. Tarde's conclusion is that it will not. At the end of the long series of alternations of custom and fashion, there will be a final movement of concentration, and custom will rule universally. The results of the diffusion of innovations by fashion will themselves have assumed the "customary" form ; but with the restored stability of custom there will be combined the acquired uniformity of fashion. Civilisation of the European type, having conquered all the others, will have become absolutely fixed, like those that have preceded it.

"Fashion," as M. Tarde understands it, is simply the extension of the relation between different classes in the same society, beyond the bounds of particular States. At certain epochs, the foreign usage has the kind of prestige that belongs to the usage of a superior class. Setting out from Mr. Spencer's antithesis of military and industrial societies, M. Tarde brings this into comparison with Tocqueville's antithesis of aristocratic and democratic societies, and finally proposes to substitute for both that of societies of predominant custom and of predominant fashion. This last antithesis, he finds, can really be made the ground for a connected set of generalisations, as the former two cannot. What is aimed at by Tocqueville and by Mr. Spencer alike is to seize upon the causal element of the social transformation going on in our own period. Two types of society are imagined, one of which has for its determining ground to be industrial or democratic, the other, to be military or aristocratic. The type of society that Mr. Spencer has in view when he speaks of militarism, Tocqueville has in view when he speaks of aristocracy, and similarly with the antithetical terms. The industrial or democratic type of society, both thinkers hold, is destined in the future to triumph over the opposite type. Neither antithesis, however, really describes the fundamental contrast of older European society with the society that is tending to be. The causal element of the modern social transformation is that where the past was formerly imitated men now take example from the present. For the fascination of distance in time is substituted the fascination of distance in space. Instead of ancestors, innovating contemporaries are followed. The industrial as opposed to the military organisation of society, M. Tarde does not find to be everywhere, or to be necessarily, favourable to individual independence. On the other hand, he accepts Tocqueville's conclusions as to the differences between aristocratic and democratic societies, if for aristocratic we read "ruled by ancestral custom," and for democratic "ruled by contemporary fashion." He finds in Tocqueville's attitude, however, a certain inconsistency. Though favourable on the whole to the "democratic" state

of society in which social uniformity is brought about by the gradual diffusion of innovations, Tocqueville, as M. Tarde points out, in the end admits that its tendency is "authoritative," while the "aristocratic" state of society, or the society ruled by custom, is comparatively "liberal"; and yet Tocqueville cared more for liberty than for equality. It is curious that there is in M. Tarde's attitude precisely the same inconsistency. As a general rule he ascribes a liberalising and rationalising influence to "fashion." Yet in the end he finds that the tendency of fashion is to be more tyrannical than custom. This inconsistency, of course, does not overthrow M. Tarde's historical generalisations, for he does not make the connexion of fashion with freedom any part of these. Its effect is simply to emphasise his own distinction between the logical and extra-logical factors of the social movement. Innovation of a more or less cosmopolitan kind has no doubt for a long time been a liberalising influence in Europe. But, as M. Tarde occasionally recognises, it has not invariably been so, and it is not necessarily so. A Medising Greek, for example, or an Ultramontane, would have to be placed among the partisans of "extra-national fashion." M. Tarde himself gives some illustrations that might be added to these, and that effectively dissociate the "extra-logical" preference to follow fashion or custom from the logical choice of liberty or its opposite.

The true "social question" of the present time, M. Tarde says in one place, is whether European civilisation shall arrive at its definitive type by discussion and criticism or by the unlimited expansion of some new social authority. The solution, he says, cannot yet be foreseen; but his desires appear to be on one side, and his expectations on the other. For while he regards it as certain that, the future order once consummated, belief will again become "intense and intolerant," that a cosmopolitan and authoritative religion (founded on science) will rule over all minds and wills, he expresses the hope that the solution may be long deferred, that our "priceless intellectual anarchy" may remain to us as long as possible. From different chapters a sufficiently clear idea

may be gained as to what the future order, in M. Tarde's view, is likely to be. Again and again he returns to the examples of China and the Byzantine Empire as illustrating the inevitable term of all civilisations. Divergent in everything that does not depend on physical and vital causes—for social progress, apart from conquest of one civilisation by another, moves not to a single end, but to many—these two completed social types are alike characterised by the fixation of highly complex customs regulating the whole of life and art. So we may expect it to be with modern European civilisation. A period of temporary mobility, such as was doubtless traversed by all the Asiatic civilisations, such as we know that Græco-Roman civilisation passed through, only prepares for the uniformity of the terminal fixation. Liberty is only a "passage between two disciplines." The idea of "equality before the law," with other juridical ideas of the kind, is destined to become a mere memory in the European consciousness. There are signs that the independent search for truth will be sacrificed to the social need for some consoling illusion. Future society will probably be strongly hierarchical, in spite of (or perhaps because of) the diffusion of the same ideas and needs through its whole mass. By progressive mixture of customs following upon their extra-national dissemination in the shape of fashion, uniformity will, without any political union, be established perhaps over the whole earth. The universal establishment of a single political organisation is also possible, though there are powerful causes that may prevent this. What we may hope for and foresee, is that individuality will show itself ineffaceable in the end, and will emerge from the society of the future with new and finer shades of difference in the form of the æsthetic life.

Others have desired or feared a new Middle Age of this kind. If we allow the chance of its appearance, we must, of course, agree with M. Tarde in the hope that its advent will be deferred as long as possible. Is "intellectual anarchy" our only security against it, or is there some deeper ground of hope that something quite different may arrive? It seems

to me that M. Tarde himself supplies us with a reason for expecting a different state of things. Our strongest security against a new epoch of authoritative social compression lies not so much in the persistence of disagreements as in a certain approximation to agreement. Societies, as M. Tarde admirably explains, always after a time of conflict arrive at the fixation of their "grammar." What if the ethical and political "grammar" of modern Europe were to consist precisely of those maxims that are required for the permanent establishment of a state of freedom? It is not necessary that there should be agreement as to the philosophical grounds of the maxims—as to whether, for example, the basis of the idea of justice is experiential or purely rational. All that is necessary is that the practical principles should be determinate and such as to gain general assent. In intellectual matters is there not already an approximation to this? If we suppose the liberty of criticism and discussion recognised as a principle and victorious in any conflict that it may have to enter upon, then by our very supposition we exclude the type of "customary" civilisation imagined by M. Tarde. Under the perpetual action of unfettered criticism no system of minute and tyrannical custom could maintain itself. Fixity of the ideal, given the disposition to use reason constantly in order to determine action, would of itself exclude fixity of usage; for it cannot be supposed that external circumstances will cease to change, and if they change, then, the ideal remaining the same, human action must vary. The last result conceivable becomes—to make use of a physical metaphor—a moving as distinguished from a stable equilibrium. To say this is even perhaps to concede too much to the idea of a fixed term; for, as M. Tarde has shown, accumulation of discoveries and inventions can go on indefinitely after principles are fixed. This accumulation does not of itself constitute the ideal; but there is an ideal in relation to which it has value; and this ideal is one which, conceived by earlier antiquity, did not find its fulfilment in the Byzantine Empire. That M. Tarde's own expectations are not so pessimistic as we might fancy is perhaps to be inferred from a passage where

he suggests that "the ideal of the future" is a modification and expansion of "the ancient city."¹

¹ All the recent attempts made in a scientific spirit to forecast the future seem to me to confirm the soundness of the Platonic dictum, that no one while he is in his sober senses can prophesy truly. In attempting political prophecy from a basis of fact and tendency, even Hume, setting out to be as cool as possible, conspicuously failed. For true prophecy we must go to poets inspired by

"the prophetic soul

Of the wide world dreaming on things to come."

THE PROBLEM OF CAUSALITY.¹

THESE substantial volumes form a piece of work that was well worth doing, and is very well done. In the shape of studies of particular thinkers, they include both a history, in effect continuous, of modern theories of Cause, and an independent discussion of the scientific validity of the conception and its philosophical basis. The author, it may be noted at the outset, proclaims himself a Kantian; and being, as nearly as possible, a pure Kantian, he finds much to agree with in English experiential philosophy both before and after Kant. It is on the experiential side of Kant that he especially dwells, one of his principal results being the rejection—in reference to the conception of Cause—of philosophic rationalism. Not merely the particular phenomena that are thought of as causally connected, but the causal relation itself, is given in experience. A mental “activity” is required to turn the “given” order into a necessary connexion; but the criteria by which we know that the relation is one of cause and effect are wholly experiential. The rationalistic view of the causal sequence, the notion of the effect as *deducible* from its cause apart from previous experience, though not yet wholly banished from scientific thought so far as it is uninformed by philosophy, can no longer have any place in the philosophical theory of science.

¹ *Die Entwicklung des Causalproblems von Cartesius bis Kant.* Studien zur Orientirung über die Aufgaben der Metaphysik und Erkenntnislehre. Von Dr. EDMUND KOENIG. Leipzig: O. Wigand, 1888. Pp. vi., 340.

Die Entwicklung des Causalproblems in der Philosophie seit Kant. Studien zur Orientirung, &c. (Zweiter Theil.) Von Dr. EDMUND KOENIG. Leipzig: O. Wigand, 1890. Pp. xii., 488.

The rationalistic notion of Cause, as the author begins by showing, was the predominant one at the opening of modern philosophy. By Descartes it was expressly formulated, and over English philosophy down to Locke it retained a powerful influence. Cause was defined as that from which the effect follows with necessity; the conception of the effect being necessarily involved in the conception of the cause. The starting-point was here given by certain scholastic definitions; but the notion of Cause took its distinctively modern character first from its combination with the monistic doctrine of the unity of composition of all things, and then from its expression in terms of the "mechanical philosophy." That it could be made use of for the actual explanation of nature was owing to the employment along with experiment, by the men of genius who founded modern physics, of the method of analysis. Galileo's foundation of dynamics, for example, was the result of the application of analytical thought to experiences of motion. Such elements in the phenomenon were distinguished as could be experimented upon in sufficient isolation. Whatever discoveries might be made by experiment thus directed, it was nevertheless a long time before science attained the conception of an observed uniformity as constituting a natural "law." For Galileo, as for Descartes, no proposition was entitled to rank as a "law" unless it could be deduced rationally from some immediately evident axiom. The art, it is true, was in analysing complex relations into simple relations that could be established or disproved by experiment; but to the completed process the form of a deduction had to be given. So long as the relations were those involved in the communication of motion by contact, they appeared so obvious that little question was raised as to the method of pure deduction being the ideal method. The "mechanical philosophy" could look forward to a complete demonstration of all natural processes from the definition of matter as having figure and impenetrability, together with like simple definitions of motion and so forth. Newton's employment of the principle of "action at a distance" was regarded by the philosophical mechanicians as a falling off from this view;

such action not being deducible from their definition of matter : and even Newton did not venture at once to reject the conception of a physical axiom as an immediately evident principle, and of a scientific "law" as to be deduced from axioms. Gravitation was asserted as something really occurring, though not in itself immediately intelligible, that might in the future receive deductive explanation. The Newtonian principle, in the meantime, was found to furnish a thoroughgoing scientific interpretation of the planetary motions such as the rigorous "mechanical" doctrine could not give, and so tended to bring into vogue an experiential philosophy for which ultimate natural laws were neither deducible from mere general axioms nor immediately evident. Then, as scientific research made its way more and more into details, there went on an accumulation of observed uniformities that could not be deduced from any recognised principles. Such uniformities also came to be called "laws," and the conception of a scientific law as a uniformity, whether deducible or not, at length became the prevalent one.

Partly promoting and partly promoted by the scientific movement towards experientialism, there was a properly philosophical movement. The Occasionalist school, anticipating later "Positivism," denied that there is any rationally deducible or immediately evident connexion among natural events ; nature, so far as accessible to science, being regarded as "phenomenal," or as consisting of appearances without real "intelligible" relations to one another. To natural science is refused the rational character that Descartes strove to impress upon it. The only recognised "cause," in the older sense, is the will of God. All relations discovered by science are, therefore, arbitrary connexions. It is not to be judged apart from experience what connexions exist or do not exist in nature. There is a fixed order in things, but no real efficiency. The efficient cause is "metaphysical." A rationalistic metaphysic is thus combined with an empirical and phenomenist view of natural law. Independently, the English experiential movement made way. From the ground of Locke's psychological criticism of knowledge, Berkeley proceeded to a com-

pletely phenomenist view of nature, and Hume to a phenomenism (in combination with scepticism) extended universally. The conception of the causal relation as a necessary connexion, involving an intelligible "power" of the cause to produce its effect, became untenable as far as the phenomenist view extended. With Berkeley it disappeared for corporeal things, but not for "spirits"; with Hume it disappeared altogether. Scientifically, no causal connexions—not even the most "obvious" mechanical ones—could now be asserted prior to experience. Influenced or not by this movement, the scientific rationalism of Descartes, while it was carried forward, was also made less rigorous. In Spinoza, indeed, it reached its consummation; but Leibniz, by his principle of "sufficient reason," prepared the way for an experiential view of natural law, combined with an *a priori* theory of knowledge. Kant, as the author maintains, brought the double development to a conclusion which is, in essentials, definitive. Later thought, while it has not failed to be penetrated to some extent by the Kantian criticism, and has made great advances in detail, has yet recurred, more or less, on one side to rationalistic doctrines of the pre-Kantian type, and on the other side to pure experientialism. A return to the Kantian criticism is still necessary, in order to correct the results of thinkers like Comte or Mill on the one side, and Herbart or Lotze on the other.

This is a general outline of what the author aims at showing historically. Let us now try to follow him in more detail, bringing out his most interesting points in relation to particular topics.

First, it may be useful to recapitulate the names of the thinkers discussed. They are, in the first volume: Descartes, Malebranche (as representing Occasionalism), Spinoza, Leibniz, Wolff, Crusius, Bacon, Hobbes, Locke, Berkeley, Hume, the Scottish School (Reid), Kant; in the second volume: Maine de Biran, Schopenhauer, Trendelenburg, Herbart, Lotze, Comte (omitted in the table of contents), Mill, Ernst Laas and Carl Goering ("German Empiricists"), Spencer, Riehl, Hartmann and Volkelt ("Transcendental Realists"), Wundt. The work is rounded off by a general "Introduction,"

a special introduction (to the first volume) on "The Causal Conception in the Natural Science of the seventeenth and eighteenth centuries," and conclusions (to the second volume) on "The Causal Conception in the Natural Science of to-day" and "The Causal Conception in the Psychology of to-day."

The maxim of Causality—or, more generally, of Uniformity of Nature—whether it is explained according to rationalistic or experiential principles, may be stated either as a law of persistence or as a law of constant sequence. With the rationalists of the seventeenth century, it tended to take the form of a law of persistence of matter and "motion." Simultaneity of cause and effect, and the implication of effect in cause, result from the purely *logical* view of the relation. To this view the ancient position that nothing is created or destroyed was taken as equivalent, and was asserted for the whole history of the world, so far as accessible to science. Revived Atomism asserted it for matter; and by Descartes and Leibniz it was applied in different ways to motion. Here, what the great speculative thinkers really did was to "postulate" that in motion there is something quantitatively constant. By purely rational deduction no approximatively accurate formulation of that which is constant was arrived at except by accident. Leibniz's view that motion, when there is question of its constancy, ought to be measured by *vis viva* and not by momentum, could not be established deductively against any other view. Yet it was the constant affirmation of such extremely general principles, supposed to be axiomatic, that pointed out the way to special investigators. The atomic hypothesis has been taken up into exact science. So also the assertion of constancy in "motion" got accurate formulation and proof, when in recent times the law of Conservation of Energy was experimentally established. A law of a certain type, or a very general hypothesis, had all along been in view as a possible means of co-ordinating phenomena. Scientific insight had only to detect the right moment for recurring to the hypothesis, or for seeking accurate experimental verification of a precise formula.

With the theories based on Gravitation and Natural Selection, as might have been shown at length, the case is somewhat different. Here an observed process, which had only been taken into account within a small range, or had been incidentally generalised in a more or less conjectural manner by some isolated thinker, was all at once taken up and made the principle of a system of scientific explanation of the highest generality. For this reason the achievements of Newton and Darwin are rightly looked upon as the supreme expressions of scientific genius. Philosophic thought had not so distinctly prepared for them as for the achievements of Dalton and Joule.

The *method* of the rationalist thinkers, we may say in general agreement with Dr. Koenig, is to a large extent justified. A large part of science owes its origin to philosophic thought ascending very rapidly to the most general principles; and even where philosophic thought has had less part in the origination of scientific theories, bold speculation and hypothesis are just as necessary as experiment. It was the conditions of *proof*, as distinguished from discovery, that remained to be established by the philosophic experientialists. The rationalistic error was not in inventing theories before finding out all that can be known of the facts, but in supposing that there can be any valid deduction of a natural process from principles of knowledge apart from the constant appeal to experience.

This error, as Dr. Koenig shows, assumed two forms. One of its forms was the supposition that effects can be deduced from causes by the logical law of Identity. The other was the attempt to construct natural laws by pure mathematics. In the thinkers of the seventeenth century the two forms are not clearly distinguishable. Among the post-Kantians Herbart illustrates the attempt to reduce all science—mathematics included—to formal logic; while the idea of a mathematical construction of effects from causes is illustrated in its purity by Trendelenburg. The Herbartian view, looked at from one side, is an extreme rationalism. Yet when the Kantian distinction between “analytic” and “synthetic” judgments

disappears in complete vagueness, so that no *a priori* is recognised but the laws of formal logic, an approach is made to experientialism.

The first advance beyond pure rationalism on its own lines was the introduction by Leibniz of the principle of "sufficient reason," or of "ground and consequent," as a scientific principle. Theoretically it was still held that all laws ought to be deduced from immediately evident principles of knowledge; but, when deduction was impossible, the actual existence of an experimental sequence under proper conditions was held to indicate that one phenomenon is the "cause" of another which constantly follows it. That is to say, if we knew its nature thoroughly we should be able to think it as the intelligible "ground" of the "effect," or succeeding phenomenon, which accordingly is to be regarded as its "consequent." The appeal to experience was admitted more explicitly by Wolff, who expressly asserted the distinction between the "ideal" and the "real" ground, left vague by Leibniz; and still more explicitly by Crusius, who made the real co-ordinate with the ideal ground, to which it had hitherto been subordinated. Thus the Leibnizian rationalism, even before Kant, was still further weakened.

In the meantime the rationalistic view, consistently worked out, had led to the assertion of a stringent determinism. Spinoza had here developed the doctrine to its legitimate conclusion. He also, first of the moderns, had found a reconciliation of determinism with the "moral freedom" of man. This was not a new problem taken up by Leibniz, as it is sometimes made to appear; nor did Leibniz, in his solution of it, succeed in attenuating the Spinozistic determinism to the smallest extent. His "moral" or "teleological" determination is no less really "necessary" than the logical or mathematical determination of Spinoza.

On the ground of experientialism Hobbes had already asserted a deterministic doctrine as rigorous as Spinoza's. By Hobbes and Spinoza, whether determinism was strictly demonstrated or not, the proof of "metaphysical freedom" drawn from the declaration of self-consciousness had been

rendered once for all impossible. This is henceforth a "classical truth."

The further transformation of rationalism by Kant consisted, so far as causation is concerned, in assigning not only all particular causal sequences, but the form itself of the causal relation, to experience; the thinking mind being held to contribute simply the affirmation of the causal relation as "necessary." This affirmation is *a priori* because it is added to the "given" experience. And nothing in it is *a priori* but the "intrinsic constraint" by which the given causal order is turned into a necessary connexion. Thus rationalism in its older form has entirely disappeared. The results of the English critical movement have been incorporated in the Kantian doctrine. The doctrine is now, as the author expresses it, "Positivism"—but with "Apriorism" superposed.

More exactly, while upholding "Positivism" against "Rationalism," and "Phenomenalism" against "Realism," Dr. Koenig at the same time places himself on the side of "Apriorism" against "Empiricism," and of "Intellectualism" (as he says) against "Sensualism." To understand his theory of Kant's view of causation we must therefore follow out separately his history of the *a priori* doctrine in modern philosophy.

The "*a priori*" is not the "innate." Locke's polemic against "innate ideas" present as such before "perceptions," was fully justified. Even in the Cartesian school, innate ideas have a "logical" rather than a "psychological" significance, though Descartes did not always make the distinction sufficiently clear. Leibniz, in his polemic against Locke, insisted more expressly on this distinction, and, by his insistence on it, was the first to put forward "theory of knowledge" as a philosophical doctrine independent of psychology. Both Descartes and Leibniz had at the same time attempted a psychological defence of their common doctrine. Ideas, it was said, are present in the mind before experience "potentially" though not actually. Leibniz therefore professed, along with logical "apriorism" a form of psychological

"nativism." Kant went beyond this point and effectually established "apriorism" as a theory of knowledge without mixture of psychology. Knowledge, he held, can only be explained in virtue of *a priori* elements, "logical" and not "psychological." What philosophy needs is an "epistemological hypothesis" showing how certain "transcendental" elements, as they may be called, since they are not discoverable in experience, but are necessary to constitute it, can explain knowledge, which cannot be explained without them. Such an epistemological hypothesis is furnished by the Kantian system.

The distinction between psychology and logic, it may be at once conceded to Dr. Koenig, is a very important one. But is it applicable in the particular way he here contends for? Are not all elements in "knowledge" elements in mind, and, as such, part of the subject-matter of psychological science? It may be said that "psychological" elements become "logical" when they are either naturally in conformity with, or are voluntarily brought into conformity with a certain intellectual "norm": but they do not for that cease to be psychological; and the bringing of them into conformity with a norm is itself a psychological process. Dr. Koenig even is disposed to find in Prof. Wundt's "apperception" the intellectual "activity" that contributes the *a priori* element in knowledge. This, he supposes, may turn merely "associative" into "logical" processes. But "apperception," if it exists at all, is a psychological phenomenon just as much as the mere associative process to which it is supposed to add itself.

These remarks have reference to Thought in general rather than to the special question of Cause. When we turn to this, the point becomes still clearer. Every *a priori* theory of Cause consists essentially in the attempt to show that there is some mental (that is, psychological) element in the conception, to the mere nature of which belongs the conferring of logical validity. That this is the case with an *a priori* theory such as that of Maine de Biran—"the French Kant"—Dr. Koenig admits. Here the causal conception is derived from ex-

periences of volition; in these experiences causal efficiency is supposed to be known directly. Dr. Koenig's criticism is that, although this theory of the causal conception may be true as a theory of its psychological origin, the validity of the law of causation is not thereby proved. But, in Kant's own theory, is it otherwise than by leaving the conception of mental "activity" quite vague that the appearance comes of introducing into the mental life something that is not "psychological" at all, but purely "logical"? If an accurate expression is desired for the "*a priori* elements in knowledge," where can this be looked for but in a determination of them by psychological analysis?

"Apriorism," it is clear, needs a psychological basis as much as experientialism. Experientialism, on the other side, can employ the distinction between logic and psychology for the vindication of scientific knowledge just as much as "apriorism." It was in part the mixture of psychological with logical points of view which, in Hume's theory of Cause, gave the experiential doctrine its sceptical colouring. To have shown this, according to Dr. Koenig, was a considerable portion of Kant's service. Now if, in reference to the conception of cause, Kant had simply pointed out this distinction, and for the rest accepted Hume's doctrine, his position would have been pure experientialism. Unless his "apriorism" can deal more effectively with the sceptical view of Cause than by a distinction which the experientialist can also make, it seems, from the logical point of view, a superfluous addition.

While taking from Hume the conception of causation as a particular kind of sequence, Kant, in Dr. Koenig's view, made it possible, as it is not for the pure experientialist, to regard causation as "necessary"; and this he was enabled to do by his philosophical "hypothesis." In this hypothesis consisted his material advance on Leibniz. While Leibniz had assumed a merely "analytic" function of the mind, Kant assumed an original "synthetic" function. "Synthetic knowledge *a priori*," made possible by this function, is found first of all in mathematical axioms; but the synthetic function of the

mind contributes also an element to the conception of Cause. Into the question of mathematical axioms and its solution on experiential grounds it is not necessary to enter. The question of Cause is what we have specially to deal with ; and it can be treated separately. It may be admitted that the clear distinction of mathematical axioms, under the provisional designation of "synthetic judgments *a priori*," from formal inferences on the one side and from *a posteriori* knowledge of natural processes on the other, was a very important step in theory of knowledge, and constituted a definite problem for experientialism¹ ; and yet it may be contended that the special Kantian apparatus has done nothing for the problem of Cause. To decide upon its value here, let us see first more precisely what can be done by experientialism. Dr. Koenig himself provides us with material for the decision.

The causal axiom, in his view, is essentially an assertion of "invariable and unconditional sequence." This view he finds with greater or less perfection in Hume, Kant, Schopenhauer, and Mill. To Hume he ascribes the first quite definite determination of the causal problem ; to Kant the banishment of Hume's scepticism by means of the *a priori* doctrine ; to Mill the statement of accurate criteria by which causal connexions may be distinguished from connexions that are not causal ; and to Schopenhauer an anticipation of the special form taken by phenomenism in Mill's view of Cause. Against Mr. Spencer and others, he urges that the causal axiom, as applying to sequences, cannot be deduced from any law of "persistence" or "conservation." The law of conservation of energy does not tell us what other form of energy will emerge as the result of the disappearance of energy in one form ; it only tells us that the quantity will remain unchanged. Phenomena may involve the presence of the same quantity of energy and yet be qualitatively different. The law of conservation, therefore, does not necessarily imply that the same cause has always the same (qualitative) effect. But this is

¹ This problem is dealt with by Croom Robertson in the article "Axiom," *Philosophical Remains*, p. 119.

required by science, and is asserted by the causal law in its ordinary form.

In recent times, the establishment of the principle of conservation of energy has helped to bring back the view of cause and effect as "identical." A "law of identity" of cause and effect, in the sense of quantitative equivalence, might perhaps be allowed if it were not for the tendency to regard it as deducible from the logical law of the same name. Dr. Koenig, in complete accordance with experiential principles, shows the impossibility of any such deduction. The Heraclitean doctrine of "absolute becoming," as it is well said in a quotation he makes from Lotze (ii. 167), cannot be refuted by the logical law of Identity; "for this only asserts that *m* is *m* in case it is, and so long as it is, but whether it is, and whether it must always be if it is once, upon those points the law decides nothing." A physical "law of identity," in short, is an assertion about real existence, and no one can be forced to admit it by the mere requirement of intellectual consistency. In this respect—that is to say, in being a material and not a purely formal principle—it is entirely on the same ground as the law of causation of successive events.

This view in its general sense, an experientialist must accept. Yet perhaps rather more significance ought to be assigned to laws of Conservation than Dr. Koenig allows. It may be conceded that such laws are not by themselves sufficient to express the Uniformity of Nature in its full meaning; yet they are the most stringent expressions of that principle. A physical "law of identity" has even a certain special force against the sceptical view of causation. The scientific statement of it is more easily detached from any psychological account of the way in which it was arrived at, than is the law of successive events. To show how we come to believe that "every event has a cause," and how our belief might be determined even if the proposition were not true, seems to throw doubt on the truth of the proposition itself. The causation of successive events is undoubtedly capable of scientific interpretation as Mill has shown; and it is indispensable scientifically; but the popular origin of the belief in causation

clings to it. A law of conservation is not only more easily viewed with regard simply to its truth or falsehood, but also, if we seek for its origin, we find it in the first impulses of speculation rather than in the "customary conjunctions" of common sense.

Up to this point, what Dr. Koenig lays down, and what has been said by way of objection or supplement, is all on the ground of experientialism. The position that can now be stated is this. Psychologically, either the view of Hume or of Maine de Biran as to the origin of the belief in causation might be accepted, and the truth of the causal law would neither be proved nor disproved. The belief may have its root in experiences of volition, or it may spring simply from observations of external sequences. In either case, the law of causation is to be affirmed not because of its origin, but because it is an indispensable postulate of scientific investigation, and is constantly verified and never contradicted by duly tested experience. Nevertheless, it must be admitted that there remains always for the experientialist the logical possibility of an exception to it. This is much insisted on by Dr. Koenig; and he apparently regards it as the great logical difficulty passed on from Hume to Kant, and not to be solved except by the Kantian "apriorism."

There is of course no absolute inconsistency between this view and the admission, which Dr. Koenig makes, that the form of temporal succession, asserted by Kant as the "schema" of Cause, cannot be deduced on Kantian principles; or at least that the deduction of it is a gap which no Kantian has yet filled up. For "apriorism," in Dr. Koenig's interpretation, does not profess to assign even the *form* of the causal connexion without an appeal to experience. By this interpretation, one great difficulty of Kantianism is undoubtedly avoided. A more serious difficulty, however, remains. For it seems as if, when the "synthetic unity of apperception" has once conferred "necessity" of thought, no scepticism as to the strict universality of the causal connexion ought to be any longer possible. Yet, for Dr. Koenig, it is not only possible but legitimate. The position of Lotze, that

absolutely "new" causes are from time to time introduced into the world, is, he says, for the Kantian as well as for the pure experientialist, irrefutable. Where then is the gain for the Kantian? Is the Kantian position, thus interpreted, even self-consistent?

In any attempt at solution of the logical difficulty put by the sceptic, Kantianism would have to proceed on precisely the same lines as experientialism. Even for the theoretical sceptic as to universal causation, there may, as Hume showed, be no grounds for holding the uniformity of nature to have ever actually been interrupted. Further, if we desire a consistent metaphysical doctrine, we may be impelled to an absolute determinism carrying with it uninterrupted uniformity of nature as a corollary. A metaphysic like that of Lotze may be rejected because it does not give intellectual satisfaction. The adherent of Kant's theory of knowledge has here exactly the same arguments at command as the experientialist; but he has no advantage.

Two points may now be selected where the Kantian influence seems to have made Dr. Koenig take up a more uncertain position than he would otherwise have done. The first is as to the relation of mind and body. Psychological causation and physical causation, he would feel himself obliged to hold, must be treated as unbroken and without mutual interference, if it were not for the "activity of apperception." This he takes as a fact, and finds to be the only fact inconsistent with a denial of "psycho-physical" causation, or the production of physical effects by a psychical activity that has no organic correlate. Isolated as it is, the fact cannot be denied; for it is required to explain the "intrinsic constraint" from which comes the peculiar necessity of *a priori* truths. With some other writers, he accordingly finds it an advantage in Hume's and Mill's theory of Cause that "psycho-physical" and "physico-psychical" causation are not excluded on principle. There is, it may be allowed, in the denial of any real break either in the series of mental or physical causes a reassertion of an old rationalistic position. The experiential philosopher, however, has no difficulty in modifying Hume's

or Mill's thought to this extent. The Kantian "apriorism," on the contrary, has introduced a special difficulty, as we see. To Dr. Koenig this difficulty appears so great that it leads him to reject what he admits to be otherwise the most consistent view, and the view best supported by experience.

The second point is as to the form of idealism to be adopted. Dr. Koenig holds firmly to the Kantian "Transcendental Idealism." This idealism, he acknowledges, has something in common with "Transcendental Realism"—the distinctive point of which is to retain in a more or less attenuated form the belief in an existence that is nothing if not "objective," and that yet has a reality apart from its relations to all subjects. In common with this doctrine, it refuses to resolve "the object of the naïve realist" into "mere representations." It recognises the rights of "empirical realism" against "empirical idealism." In other words, Dr. Koenig, like most Kantians, stops short of the consistent idealism arrived at on experiential grounds. The connexion of "apriorism" with this inconsequence is evident when he admits that Kantianism involves a difficulty never yet solved—and which he himself does not profess to solve—in the "coincidence of the empirical (corporeal) with the transcendental subject." For a thorough-going idealism this difficulty does not exist. When idealism is held quite consistently, the "corporeal subject" (as it has been put) is purely phenomenal. On the common ground of an idealistic and experiential theory of knowledge, different metaphysical doctrines may be arrived at; but the particular difficulty of accounting for the manifestation of a "transcendental subject" in a material organism has disappeared. Dr. Koenig's own view, except at certain points, is consistently phenomenist. His lapses into realism are clearly due to over-strict adherence to Kant.

Generally, there is more in Dr. Koenig's book for an experientialist to agree with than to disagree with. No attempt has been made to convey an idea of his full and careful examinations of particular thinkers. It can only be said that his exposition is of sustained excellence; being

everywhere clear, impartial and appreciative. The result of the whole is to display one thing especially; and that is the steady philosophical advance that has been made in the discrimination of scientific conceptions and in the interpretation of natural law. To show this, no schematic arrangement of thinkers according to a theory of the historical movement has been necessary. When, in the first volume, Dr. Koenig places the Continental rationalists in a series by themselves, then the English experientialists, and lastly Kant, he simply follows the traditional order without intending to maintain that either series is a wholly separate movement uninfluenced by the other. Indeed, he remarks that one of the few cases of strict "continuity" that the history of philosophy presents is the discussion of mental "relations" by Hume, Kant and Herbart. The typical example of philosophical continuity is, with him, the succession from Locke, through Berkeley, to Hume. This absence of any attempt at exact historical arrangement of thinkers in a line of development makes the advance that the reader may see in the whole movement, and the continuity of the movement in a certain sense, more impressive. Perhaps it ought to be added that—as Dr. Koenig has borne in mind—a condition of perceiving the development is to keep in view especially the philosophy that has been in some kind of contact with science. This does not seem unreasonable when that which is in question is the logic of scientific thought.

THE PHILOSOPHICAL BASIS OF EVOLUTION.¹

THE author of this book, eminent for the cosmological width of sweep which he gave to his geological inquiries, died near the close of 1890, a few weeks after its publication. In many ways it is a work of special interest. Although the best part of Dr. Croll's life had been given to scientific pursuits, it is really a return to the problems that had been the first to occupy him. The conditions under which he had devoted himself to science as well as to philosophy had not been the most favourable; but, if we are to make the comparison, his interest in philosophy seems to have come to him most from nature, and his interest in science from circumstances. The present work bears the mark both of philosophical consideration applied to science and of the influence of the scientific spirit on a philosophical mind that had never become estranged from theology. So far as results are concerned, the author may be described as a theist who accepts scientific evolution in its full sense, and who places philosophical determinism at the base of this. The detailed argument is carried through with great clearness and vigour, and brings to light the interaction of new and old elements of thought that are all in their different ways powerful at the present time.

The first point to be noted is the author's clear view of the necessity for definiteness in scientific explanation, and for permanent distinctions between the different sciences. This he enforces by very decisively separating the problems

¹ *The Philosophical Basis of Evolution.* By JAMES CROLL, LL.D., F.R.S. London: Edward Stanford, 1890. Pp. viii., 204.

of the "production" and the "determination" of motion. The process of evolution is perfectly continuous, and beneath it there is a constant ground which it is for the physicist to define. The changes in which evolution consists can all be expressed as motions, and motion may rightly be described as always "produced" by force. The history of the "production" of things may be traced back indefinitely, and nowhere is the ground of production found to be other than constant. This, however, does not exhaust the scientific view, nor even express its most important side. Molecular forces, to which all others may ultimately be reduced, have their particular directions and points of application, and enter into action at fit moments of time. These definite and particular determinations can only be explained from previous determinations which are equally definite and particular; and those again from others. In the transformations of energy we say that the energy is the same all through. The effects, however, are different. Thermal and electrical energy, for example, manifest themselves in different ways; and it is because of their different modes of manifestation that we call them different energies. Just as we are not to call electricity a form of heat because the energy of electricity can be transformed into the energy of heat, so it is not admissible to say that the energy manifested in organic life is merely physical and chemical because it can be transformed into various physical and chemical energies and because these energies are at the ground of vital processes. The modes of energy being different, the uniformities of connexion between them can never be all reduced to a single physical law.

This view has its application to mind also. Mental evolution, like material evolution, is continuous. What is constant in it is "mind"; but here again true scientific explanation depends on regarding mind as definitely determined. To speak of the production of acts by the will, for example, may be correct as far as it goes; but every act is a determinate act, and the determination has to be explained by something other than "will." The act of choice in its definite cha-

racter is rather to be explained by the "agreeableness" or "reasonableness" of a suggested direction than the direction by the mere act. In mental even more than in natural science the definite determination, and not the mere production, is the important thing.

The idea of "determination," thus scientifically generalised, is made use of to arrive at a philosophical view of nature and mind. From the impossibility, or at least excessive difficulty, of admitting an infinite regress in the series of past events, the author infers that the world must have had a beginning. Its determination can then, as he holds, only be explained by theism. We must suppose all determination in the world to take its origin from a determination in the mind of God. The series of events in time is not eternal, but their determination is eternal. This determination Dr. Croll is led to conceive of as strictly necessary. His doctrine is therefore at once a philosophical and a theological determinism.

Dr. Croll's theism implies a teleological view of things; and this view he seeks to defend against some interpretations of organic evolution. He succeeds in showing that natural selection does not exclude every kind of teleology; though, of course, something might be said against his contention that teleology in the form of "objective ideas" of species and so forth is still required by science. The better course here, from his own point of view, would have been simply to show the independent range of philosophical interpretation. "Natural selection" itself as a scientific theory, Dr. Croll remarks in more than one passage, derives all its efficacy from being a theory of "determination." It is not a theory of the "production" of forms of life, but explains how determinate forms arise under definite conditions.

The question of Free-will is discussed in an especially interesting way. From the body of the work the author seeks to exclude it as irrelevant to his general scientific and philosophical positions. Advocates of free-will, he argues, do not really intend to deny the universal validity of the law

of causation. Express discussion of the question is relegated to an appendix. Here Dr. Croll shows, in spite of the concession made elsewhere, that the believer in free-will ought if he is consistent to deny the absolute uniformity at least of psychological law. He himself, both on scientific and philosophical grounds, refuses to admit the exception involved in free-will. Many well-pointed arguments against the indeterminist position might be quoted from the chapters he devotes to the subject. The illusory belief in an undetermined will is explained especially from the determination of action by psychological states that are not brought into clear consciousness. "I am directly conscious of the act of the will; but not, at the moment, of the manner in which it was determined." As soon as particular mental states are distinctly recognised they become, as it were, "objects," like those of the external world, and are thought of as something that is not the Ego. Then the notion arises of an exertion of will that is independent of these, as of other particular objects. An act of which the causes are not known at the moment is not, however, an arbitrary "act of will" pure and simple, but has really been determined by states that only require a new effort of introspection to bring them into clear consciousness.

When we regard an action as "our own" we hold ourselves "morally responsible" for it, however necessarily it may have been produced. It is our own action because it is the result of our own nature. The relation between action and internal nature in general is this, that "the fruit is bad because the tree is bad" and "good because the tree is good." When an action is compulsorily determined, or proceeds from something outside our own nature, we do not feel that it is our own; hence a mechanical conception of the necessity of human actions, or a conception of them as necessarily determined from outside, may tend to produce theories of irresponsibility. This, however, is not really the conception of the philosophical determinist. Necessity, in its philosophical sense, is simply "the certainty that is in things themselves." By insisting on the inevitable con-

sequences of actions, the theological form of determinism, far from weakening, has strengthened the sense of responsibility.

This last contention of Dr. Croll's can be justified negatively as well as positively. When they apply their view to ethics, the theological and the philosophical determinist are on the same ground. Both must hold that actions necessarily determined quite rightly carry with them not merely the consequences that depend directly on the agent, but also consequences depending on the nature of men in general and on the requirement of definite means for the attainment of social ends. And the ideas of "irresponsibility" now in the air proceed really from the doctrine of free-will. Accept determinism in the full sense, and it becomes evident that some criterion of the "imputability" of an action to a person will have to be sought other than the absence of necessity; since actions are all necessarily determined either from without or from within. On the contrary, adopt a view of guilt and merit essentially identical with that which is derived by Catholic theologians from their doctrine of indetermination, then every action that can be proved scientifically to be necessitated is at once regarded as something for which no responsibility can be imputed. The demoralising consequences that may be drawn do not, however, spring from the scientific proof of necessity, but from its combination with that doctrine of free-will which is regarded by many as the one support of moral responsibility. With philosophical determinism there is no danger of any such consequences.

APPENDIX.

APPENDIX.

I.—CORRESPONDENCE.

[In the *Critique Philosophique* of May 31, 1887, appeared a translation, by M. Renouvier, of the author's review of his *Esquisse d'une Classification systématique des Doctrines philosophiques* (see p. 228). This was introduced by the sentences that follow. Succeeding numbers contained M. Renouvier's reply to criticisms, a letter of the author, and a second reply. These are reproduced exactly as they appeared. One remark may be added; and that is, that in the short paper, given above, on "The Theory of Justice," an attempt is made to show that a greater actual agreement between the opposite ethical schools is attainable, without desertion of logic, than M. Renouvier, in the concluding words of his second reply, seems to think possible.]

UN COMPTE RENDU DU DERNIER OUVRAGE DE M. RENOUVIER.

La *Critique philosophique* n'a pas rendu compte du dernier ouvrage de M. Renouvier : *Esquisse d'une classification systématique des doctrines philosophiques*. Nous avons pensé que nos lecteurs connaissaient assez ce livre, qui avant d'être publié en volumes, a paru presque en entier dans la *Critique religieuse*, ou dans le supplément par lequel s'est terminée cette publication. Toutefois, la revue philosophique anglaise, le *Mind*, a donné, sous la signature de M. Thomas Whittaker, un compte rendu de l'*Esquisse de classification*, que son rare mérite nous engage à reproduire ici en traduction. L'esprit de l'ouvrage y est saisi, les idées dominantes y sont indiquées, quoique brièvement, avec une exactitude et une impartialité remarquables. L'indépendance de jugement de l'auteur de ce travail donne, à ce qu'il nous

sembla, un intérêt particulier à l'exposition d'idées qu'il paraît en somme comprendre plutôt qu'il ne les partage toutes volontiers, et à des éloges trop précisément motivés pour être dus seulement à la bienveillance et à l'aménité naturelles de l'écrivain qui les accorde. D'ailleurs les objections de M. Whittaker au système de classification adopté par M. Renouvier, et aux oppositions essentielles et permanentes de doctrines sur lesquelles ce système est fondé, sont de celles dont la discussion a le plus d'utilité et de portée. Afin d'y répondre, il convient de les rapporter dans tout leur développement. Nous remettons au prochain numéro la réponse de l'auteur de l'*Esquisse* aux remarques et aux doutes de son profond et bienveillant critique.

RÉPONSE A QUELQUES OBJECTIONS CONTRE UN SYSTÈME DE CLASSIFICATION DES DOCTRINES PHILOSOPHIQUES.¹

La principale des objections de M. Whittaker, que je vais examiner brièvement,—non pas toutefois avant d'avoir cordialement remercié mon intelligent critique pour sa grande bienveillance, et pour ses objections mêmes, qui sont sérieuses et approfondies,—concerne le rapport à définir entre les doctrines spéculatives et la philosophie pratique, la raison pratique. Au premier abord, on peut ne pas bien voir comment la manière de comprendre ce rapport se lie à une tentative de réduire en système, pour ainsi dire, les systèmes, en procédant à une classification de tous ceux auxquels il est possible à la pensée humaine de parvenir et de s'arrêter. Cependant, ce sont là deux questions étroitement unies. Si, en effet, l'on admet la valeur absolue de la raison théorique, l'*évidence* des premiers principes, la certitude apodictique, la *démonstrativité* sans réplique d'une doctrine universelle *vraie*, rendue indubitable à tous, on pourra bien encore se proposer l'examen et une certaine coordination des systèmes passés, ou encore existants, qui s'écartent de la doctrine ainsi établie ou imaginée; mais c'est alors un traité des erreurs, que l'on croira composer, un répertoire des *sophismes*; ce ne sera plus chercher et définir ce que sont et comment s'accordent ou s'opposent les conceptions par lesquelles une pensée libre, s'appliquant à l'intelligence de l'univers, résout les problèmes fondamentaux de l'existence, et prend une position, inexpugnable en fait, contre tous arguments contraires de logique pure. On se pose, au contraire, tout naturellement ce dernier problème, et je m'y suis moi-même trouvé conduit, en reconnaissant que la raison pratique décide au fond ou en dernier ressort de l'adhésion d'un homme à l'un des grands systèmes de la connaissance spéculative.

M. Whittaker, pour qui l'expérience est ce qu'elle devrait être pour tous, c'est-à-dire d'un grand poids, ne paraît pas, en quelques passages, éloigné de reconnaître que les systèmes peuvent se ramener par le fait à quelques oppositions fondamentales (si ce n'est précisément à deux, qui réunissent toutes les autres), entre lesquelles la raison théorique pure est impuissante à décider la question et à forcer les esprits. Il ne laisse pas de croire que cette raison théorique est un idéal juste et suffisant, et le seul légitime dans

¹ *La Critique Philosophique*, June 30, 1887.

l'espèce. Et cependant, il est clair que, si les penseurs n'arrivent jamais à poursuivre et à contempler un même idéal, ou, pour parler encore plus exactement, si on les voit de tout temps en contempler d'opposés et de contradictoires, c'est qu'il doit exister pour eux d'autres raisons de détermination que la prétendue raison théorique pure. Et s'il en est ainsi, ce qu'un penseur consciencieux, succédant à la longue expérience des autres, a le mieux à faire n'est-il pas de trouver, entre des conceptions contraires, un autre moyen d'option que celui qui s'est toujours montré impuissant à faire opter en un même sens les philosophes, et de contrôler ouvertement son propre idéal par les données d'un domaine secret et méconnu, où ceux-ci ont, au food, et au moins en partie, puisé les raisons qui ont déterminé le leur? Ces raisons sont le désir et la volonté; il y a chance de les faire intervenir plus légitimement en se les avouant et leur cherchant des applications justes, qu'en subissant, au hasard des passions, leur empire qu'on se dissimule.

M. Whittaker ne conteste pas la présence des éléments actifs et passionnels dans les motifs des décisions doctrinales des penseurs. Mais, il voudrait qu'une doctrine procédât de l'émotion et de l'activité, seulement par le goût désintéressé de la recherche et de la connaissance, et par l'ardeur des sentiments qui nous portent au vrai purement intellectif, à une doctrine toute conforme au pur "idéal de la science." La philosophie opérerait son retour à la pratique—car il faut bien qu'elle y revienne, on est d'accord de cela—seulement après avoir épuisé la théorie. La pratique serait une application de la théorie, à peu près comme on l'entend dans les arts. Ce n'est pas à la raison pratique et aux postulats qui s'y rapportent, qu'on demanderait de fixer les premiers principes desquels doivent dépendre ou l'affirmation ou la négation de telle doctrine qui se dit la plus fidèle à l'idéal de la science; c'est à la spéculation guidée par le pur *amor intellectualis*. Mais qui ne voit que cette manière de comprendre l'organisation de la philosophie suppose alors cet idéal vraiment déterminable au point de vue purement intellectuel de science universelle, et ces principes irréfragablement démontrables? Et qui ne sait que le criticisme, c'est-à-dire la subordination des doctrines transcendantes à la loi morale, est né d'une analyse qui a constaté ce que pouvait déjà faire présumer l'expérience historique des contradictions des philosophes, à savoir que cet idéal et ces principes manquent toujours à réaliser la double condition *sine qua non* d'une philosophie théorique pure: la nécessité et l'unité? Spinoza, cité avec faveur par M. Whittaker, entendait bien que tout fût ou évident de soi ou démontré apodictiquement dans sa doctrine. Et qui croit aujourd'hui que l'*amor intellectualis*, en cela, ne l'a pas trompé?

Mais, on se demande s'il n'est pas à craindre que le philosophe, en se guidant dès le début par des considérations de l'ordre pratique, ne tranche par avance des questions dont l'analyse et l'examen sont précisément sa fonction, et n'invalide les conclusions à attendre d'une critique impartiale? Cette objection part d'une idée inexacte du criticisme. Le philosophe criticiste n'a, au point de départ de son étude, ni plus de postulats, ni d'autres postulats, ni plus de vues pratiques que n'en ont les penseurs dont les résultats diffèrent des siens. Il a derrière lui toutes les spéculations

rationalistes du passé, il les reprend, il les examine, il a les siennes propres, il remplit la tâche des investigations et des analyses en tout ce qui concerne les formes de la pensée, les conditions du raisonnement et les motifs d'ordre logique des conclusions et des croyances. C'est seulement à ce moment que se présentent à lui les moyens de suppléer à l'insuffisance du pur intellect et de la pure expérience pour se porter à une affirmation touchant les problèmes ultimes de la philosophie et de l'ordre du monde. Il est bien vrai qu'il peut se tromper dans la balance des motifs d'espèce diverse dont dépend sa conviction finale ; mais l'intellectualiste et le dogmatiste peuvent se tromper en sens inverse, et le métier du criticiste est tout spécialement de faire cette pesée des motifs.

Autre objection : " l'argument de pari " de Pascal, même après la grande rectification et la généralisation qui lui est apportée, reste impuissant à conclure, faute d'avoir pour véritable objet une croyance théiste à envisager, *semper, ubique, ab omnibus*. Cet objet n'est encore que le fantôme d'une religion historique particulière. L'alliance, regardée comme possible, du criticisme et d'un christianisme affranchi des dogmes théologiques absolutistes n'est-il pas un aveu de ce caractère de la croyance criticiste ? — Réponse : le *quod ubique et semper* est une chimère. On ne saurait lui trouver la moindre matière dans l'histoire des idées et des croyances. Mais les postulats du criticisme kantien : *divinité, immortalité, liberté*, sont tous trois antérieurs à l'ère chrétienne, et de vrais, d'incontestables produits de la philosophie de l'antiquité. Comment donc se pourrait-il qu'ils ne représentassent plus aujourd'hui que le fantôme des croyances chrétiennes ? Ces dernières, si je les prends dans la religion proprement dite, dépendent entièrement de la foi dans Jésus-Christ, dont la philosophie ne s'occupe pas ; et, si j'y considère ce que les théologiens y ont ajouté, elles consistent en ces dogmes métaphysiques, cet absolutisme et cet infinitisme, que précisément le criticisme rejette.

Revenons au rapport de la métaphysique et de la morale. La primauté de la métaphysique, primauté logique et hiérarchique, a été, on peut le dire, unanimement reçue chez les philosophes avant Kant. Spinoza, plus qu'aucun d'eux, à cause de la construction *more geometrico* de son système, l'a mise en relief. Si cependant il n'a pas laissé de déduire l'éthique d'un idéal emprunté directement de la nature humaine au lieu de chercher quelles idées pouvaient suggérer en morale sa conception de Dieu et de l'univers, et les lois nécessaires de la nature, c'est l'effet d'une belle inconscience : non pas, entendons-nous bien, d'un faux raisonnement qu'on puisse spécifier, mais enfin d'une double tendance et d'un double principe chez le penseur qui ne réussit pas à réaliser, comme il s'en flatte, l'unité de la connaissance et l'accord de la théorie et de la pratique en un système unique de déductions. M. Whittaker estime qu'on peut sans inconséquence tenir séparés les points de vue " éthique " et " théorique, " n'établir entre eux ni subordination ni sacrifice d'aucun côté : cela ne se peut pourtant qu'à la condition de renoncer à la solution du problème capital du rapport de l'homme à l'univers, c'est-à-dire de professer un scepticisme limité, un certain positivisme, et de reconnaître que si, seuls, au fond, le panthéiste ou l'athée étaient dans le vrai, la théorie pure leur donnant raison quant à la

nature de l'univers, alors la loi morale, tirée de la nature propre de l'homme, serait une anomalie dans l'ensemble des choses et s'imposerait arbitrairement; que si, au contraire, la loi morale avait une valeur absolue, il semblerait bien que la nature de l'univers doit être au fond différente de ce que prétend la théorie. La position mentale qui ressort de ce doute est un pauvre idéal pour un philosophe.

M. Whittaker est frappé comme moi du contraste entre le sentiment pessimiste d'un J. St. Mill, en son célèbre *Essai sur la Nature*, et le sentiment optimiste d'un Darwin, que ravit le spectacle de la guerre universelle des êtres vivants, donnée comme loi directrice à l'univers par son créateur. Faudrait-il donc rester neutre entre ces deux sentiments, ou consentir à les éprouver, tantôt l'un, tantôt l'autre, selon le côté par où l'on regarderait les choses, et selon qu'on les rapporterait, pour les juger, à la loi de l'humanité ou à la loi universelle du fait et de la force, embellie et transfigurée par la contemplation scientifique? La neutralité est et paraîtra de plus en plus difficile à garder, le problème total subsistant toujours, à mesure que le jugement à porter sur le monde au point de vue du bien et du mal dominera davantage dans les préoccupations des penseurs, ainsi que se marque si clairement, de notre temps, la tendance de la philosophie.

Au sujet de l'antinomie du devoir et du bonheur, M. Whittaker remarque que l'on peut bien ne point regarder l'obligation morale et son corrélatif, le droit, comme des "ultimes en éthique," et toutefois ne pas les traiter d'illusions, ne pas mettre à leur place, pour fondement de l'ordre social, quelque idée de bien commun et de bonheur, qu'on imaginerait réalisable ou par la voie de la contrainte imposée aux individus, ou par celle d'une sympathie spontanée, pour laquelle on compterait sur leurs dispositions naturelles, très gratuitement supposée. Le droit et le devoir conserveraient une "validité relative." Ici, je ne comprends pas bien la pensée de M. Whittaker. On est obligé ou on ne l'est pas. L'établissement de ce qui est juste dans les cas particuliers peut comporter une casuistique, sans doute, et une *relation* aux circonstances, par suite : mais la justice elle-même est et ne peut être qu'un *absolu*. Mais on est dans un "parfait accord pratique" avec le criticisme, dit M. Whittaker, avec la morale du devoir, quand on reconnaît, comme fait le criticisme, "que le plus haut bien, tout en étant obtenu socialement, doit être un bien pour l'individu, et que la liberté personnelle est une condition pour l'obtenir . . . quoiqu'on puisse faire des droits et des devoirs des déductions de la conception du bien et non des conceptions ultimes." L'accord pratique ou, plus exactement, politique, existe, en effet, dans ce cas, mais les théories diffèrent du tout au tout, le théoricien du bien ou du bonheur ayant à définir ce bien, à prouver que le droit et le devoir s'en déduisent en effet, qu'ils en sont des moyens plutôt que des obstacles, et que la liberté, qui n'a plus rang de premier principe, ne se trouve point par là même subordonnée et, à l'occasion, sacrifiée. Le théoricien de la morale de l'obligation, lui, a son principe irréductible dans le devoir, et ne peut être conduit d'aucune manière au sophisme moral de la justification des moyens par la fin.

L'objection tirée de ce que "le mot *obligation* implique commandement émané de quelque source, et que le commandement ne peut pas être la

raison dernière en éthique," cette objection ne repose que sur une équivoque entre la *loi externe*, de source externe, qui est le sens le plus ordinaire et courant du commandement, soit dans l'ordre civil, juridique et politique, soit même en religion, et la *loi morale*, loi interne, exclusive de contrainte, contradictoire de contrainte, impliquant liberté, qui ne tient de l'idée du commandement que par le caractère impératif qu'une conscience autonome lui reconnaît d'elle-même sur elle-même.

Au surplus, je ne vois point que ce soit "avoir du mérite personnel une conception différente de celle de Kant" que d'accorder à l'école empirique un fait que M. Whittaker énonce en termes excellents. Je regarde, moi aussi, comme très vrai que "l'acceptation volontaire d'un code moral dépend après tout du fait empirique de la nature sociale de l'homme," et que "le degré auquel les hommes se conforment dans leurs actes aux principes admis par eux dépend du degré même où certaines dispositions existent actuellement." Mais cette vérité n'a point pour conséquence la réduction de la théorie morale à des principes tels que ceux de la sociabilité, ou de la sympathie, ou de l'intérêt bien entendu, selon le degré de force qu'ils ont chez chacun, et selon les interprétations et applications que chacun en peut faire. Il est bien clair que le principe de l'obligation lui-même ne saurait produire d'effets pratiques qu'autant qu'il est senti et reconnu par les hommes; mais ce principe a le mérite unique, en théorie, de ne dépendre en rien ni des sentiments altruistes existants plus ou moins chez les individus, ni de la manière dont ceux-ci comprennent personnellement le bonheur, ou leurs intérêts particuliers, ou l'utilité générale. L'antinomie du devoir et du bonheur demeure bien entière, malgré les réserves de M. Whittaker: elle est inévitable, par ce seul fait que l'intérêt et le sentiment sont exclus du premier principe de la théorie éthique, et qu'ils sont cependant des éléments essentiels de la nature humaine. Là est la source de grands problèmes dont nous n'avons pas à nous occuper ici.

La question de l'infini numérique a été si souvent traitée dans la *Critique philosophique*, que je n'y reviendrai pas en cette nouvelle occasion. M. Whittaker voudrait affaiblir l'opposition doctrinale entre l'infinisme et la doctrine du fini, ainsi qu'il s'efforce de la faire pour d'autres oppositions. Il voudrait au moins lever la contradiction formelle. M. Hodgson, si ce n'est M. Vacherot, lui paraît venir à bout de cette difficulté. Le premier, avec qui j'ai eu l'honneur de rompre quelques lances, estime que la perception constate l'existence de l'infini, dans le temps et l'espace, parce qu'elle laisse toujours un "reste inexploré" partout où elle s'applique: c'est, d'après lui, la représentation qui est incapable de s'étendre sans contradiction aussi loin que les phénomènes, à l'infini. Je pense, au contraire, qu'il est illogique de conclure, de ce qu'il y a toujours un reste pour la perception, qu'il y en aurait toujours un à quelque point que la perception fût prolongée; et, selon moi, c'est la représentation précisément, non la perception, qui, par l'idée de la possibilité indéfinie d'ajouter, et de compter, de concevoir des multiples et des diviseurs, pose les prémisses de la fausse induction d'un infini numérique actuel ou réalisé. Mais quoi qu'il en soit, il y a toujours une opposition inconciliable entre la doctrine de l'infini actuel et celle qui réduit la notion d'infinité à la notion de possibilité, et

M. Whittaker veut bien recommander à l'attention de ses lecteurs la section de mon livre où cette opposition est étudiée dans l'histoire.

Il me reste à dire un mot de l'antinomie de l'évolution et de la création. Les deux systèmes entre lesquels je place l'opposition irréductible qui est l'un des éléments de ma classification dichotomique,—l'un des membres de la division qui, pour chacun d'eux, réclame du penseur une option logiquement forcée,—sont, d'une part, le système de la substance éternelle et nécessaire (Matière, Force, Nature) dont le développement, nécessaire comme elle, produit tous les phénomènes; d'une autre part, le système du commencement absolu du temps et des phénomènes, en un acte pur de création. Le premier a, je crois, une existence assez considérable à toutes les époques, et à la nôtre, pour qu'on ne lui marchande pas sa définition nette, intransigeante. Le second est le contradictoire du premier. L'essai de transaction dont parle M. Whittaker, la ressource des évolutionnistes qui tentent de sauver la création en la regardant "comme le début d'un procès universel d'évolution," constitue une doctrine mixte et non point une conciliation entre les termes de la dualité doctrinale, telle que je l'ai définie. J'ai discuté récemment cette doctrine mixte, en des articles polémiques. J'ai seulement à remarquer ici que, quelque tenable qu'on jugeât celle-ci en elle-même, ma classification et l'option forcée qui en résulte sont inattaquables, dans les termes où je me suis expressément placé pour rendre la conciliation logiquement impossible.

La conclusion critique de M. Whittaker est que peut-être la divergence des philosophes se produit en réalité par rapport à plus de deux types, et qu'on pourrait soutenir que les doctrines mixtes, dont je reconnais l'existence comparativement à mes deux types définis, ne sont pas toutes aussi illogiques que je cherche à montrer qu'elles le sont. C'est m'accorder un grand point,—sans parler d'autres éloges auxquels je le prie de croire que je suis extrêmement sensible,—que de me reconnaître le mérite d'avoir introduit dans l'histoire de la pensée philosophique une méthode qui doit s'imposer désormais: la méthode contraire et complémentaire de celle du processus progressif, la méthode de l'opposition et des distinctions croissantes des doctrines. N'est-ce pas une conséquence visible de l'accueil fait à cette dernière, que la reconnaissance d'un partage dualiste des systèmes: affirmation et négation persistantes sur certains points, toujours les mêmes? La question logique ne se pose-t-elle pas, en ce cas, très naturellement, de démêler les réelles oppositions irréductibles, d'assembler les unes avec les autres celles qui s'appellent, se soutiennent ou s'impliquent mutuellement, et de ramener ces groupes au plus petit nombre possible? Et n'y a-t-il pas lieu de présumer, d'après la nature de l'esprit humain, que l'inconciliabilité doit au fond reposer sur une seule et même détermination capitale, où l'affirmation et la négation sont également possibles? Et enfin la question morale ne vient-elle pas à la suite de la question logique, en sorte qu'une fois le partage avéré de la philosophie entre deux camps adverses, le penseur doit conclure au scepticisme, ou opter entre deux croyances, embrasser l'une, rejeter l'autre?

Mais n'y a-t-il vraiment que deux partis entièrement nets entre lesquels le choix se limite, au moins pour la vue élevée des choses, ou la plus déci-

sive ; et ces partis sont-ils bien ceux que j'ai définis ? Ici je prie mon critique de distinguer entre les deux points de vue où j'ai dû me placer : l'un historique et empirique, pour l'étude et l'interprétation des systèmes, et pour l'explication de ce qu'on peut appeler leurs inconséquences ou leurs anomalies ; l'autre logique, pour la définition des solutions, formellement contradictoires, qui ont été et qui sont encore et toujours proposées, d'un petit nombre de problèmes fondamentaux dont l'étude embrasse tout le domaine de la spéculation philosophique. De là deux sujets entre lesquels se partage mon *Esquisse de classification*. Le premier ouvre, on le conçoit, une ample carrière à la discussion des thèses plus ou moins particulières des philosophes, qu'il s'agit de ranger sous des chefs généraux de doctrines. Je pense, malgré cela, avoir montré qu'en somme, une dualité suffisamment définie se dessine entre les décisions multipliées, et que cette dualité se forme le plus souvent ou approximativement, de chaque côté, par la réunion des mêmes affirmations ou des mêmes négations partielles. On ne devait pas s'attendre à ce que le domaine expérimental des opinions, naturellement exposées à tant de variations et de perturbations accidentelles, offrît plus de conformité avec une distribution régulière et systématique des vues possibles de l'esprit. Le second sujet de l'ouvrage, celui qui concerne le plan même de la classification dichotomique et la justification logique de ses membres, contradictoires deux à deux, est assez concluant par lui-même pour que, sans exiger plus de points de vérification, ou plus constants et plus absolument nets qu'ils ne ressortent de l'ensemble et de la succession des principales idées philosophiques, on se trouve conduit au but que j'ai visé. C'est de considérer le problème général de la philosophie sous la forme d'un dilemme, posé au fond dans l'esprit, et constamment proposé, sous des termes divers, aux penseurs individuels, dans l'expérience et dans l'histoire. Et c'est de faire ressortir la nécessité morale où se trouve chacun de prendre un parti dans ce dilemme, soit qu'il se croie ou qu'il refuse de se croire invinciblement porté lui-même à sa décision par quelque chose d'extérieur à sa conscience.

C. RENOUVIER.

LETTRE.¹

Puis-je demander une petite place dans la *Critique philosophique*, afin d'offrir d'abord à M. Renouvier mes remerciements pour la traduction de mon article, et pour les remarques dont il l'a accompagnée ; et puis pour éclaircir ma position sur quelques points qui sont discutés dans la réponse où il m'a fait l'honneur d'examiner mes objections.

Certaines de ces objections étaient, comme le dit M. Renouvier, de simples "doutes," que sa réponse écarte en grande partie. Tel est, par exemple, le cas, pour mes remarques touchant la méthode dichotomique, dont il présente si clairement, dans ses deux derniers paragraphes, et la justification rationnelle, au point de vue où il se place, et les limitations historiques. De même, les réponses aux objections où il est allégué que la méthode de la "raison pratique" peut nuire à la fonction critique de la

¹ *La Critique Philosophique*, August 31, 1887.

philosophie par rapport à la pratique, et que le type "criticiste" du théisme est associé exclusivement à une seule religion historique, me semblent écarter les difficultés. En effet, les objections ont toutes deux trait aux applications qu'on pourrait faire de la méthode en question, plutôt qu'à la doctrine criticiste de M. R. lui-même.

La différence de vue réellement fondamentale est naturellement celle que M. R. a fait passer en première ligne. Soit accordé que la classification des doctrines est logiquement faite, et que deux systèmes définis se trouvent désormais opposés l'un à l'autre, comment notre choix entre eux doit-il être déterminé? Ce que j'ai soutenu ici n'était pas, comme M. R. semble le comprendre, pour opérer un retour à la doctrine de l' "évidence." J'admets que Spinoza, par exemple, aurait prétendu que tout, dans son système, s'impose à l'esprit par sa propre évidence, ou par démonstration apodictique. J'admets aussi que la critique philosophique a rendu impossible, pour un système philosophique du type du spinosisme, la tâche de défendre sa prétention à ce genre de certitude. La position agnostique ferait naturellement de la métaphysique, pour autant qu'elle est conservée, une simple propédeutique négative au système des sciences : Supposons que cette position soit également rejetée, et que, avec M. R., nous accordions qu'un choix est nécessaire entre les deux doctrines métaphysiques opposées. Ici, la position que je défends, c'est que l'acte du choix doit être déterminé non par les émotions relatives à la pratique, mais par l'espèce d'émotion qui détermina réellement la forme de la doctrine de Spinoza, quoique lui-même ait pu regarder cette doctrine comme forcée pour l'esprit à raison de sa pure évidence. Cette position, sans aucun doute, suppose un idéal intellectuel suggéré par la science. Mais un tel idéal, si nous acceptons la dichotomie de M. R., n'est-il pas déjà donné dans le système panthéiste? Sans regarder ce système comme susceptible d'une démonstration scientifique irréfragable, nous pouvons fixer sur lui notre choix par un acte de ce qu'on peut appeler "croyance intellectuelle." On peut être intellectualiste sans être dogmatiste.

En discutant le rapport de la métaphysique à la morale, je n'ai pas entendu proposer "un scepticisme limité," une "neutralité" motivée par un doute sur la nature ultime des choses, mais seulement soutenir la parfaite compatibilité du panthéisme le plus conséquent avec le maintien de la vue éthique, sans qualification, partout où la volonté humaine peut être conçue comme ayant de l'influence sur le cours des choses. Ne serait-il pas vraiment incompatible avec l' "autonomie de l'éthique," de dire que, parce que la loi morale n'a nulle application à l'ensemble des choses, elle cesse d'être obligatoire pour les hommes? On dira peut-être que faire du point de vue théorique et du point de vue éthique deux points de vue coordonnés, au lieu de subordonner l'un des deux à l'autre, c'est laisser subsister une dualité que des penseurs panthéistes, tels que Spinoza et les stoïciens, ou n'ont pas aperçu ou ont cru qu'ils évitaient. Mais on peut répondre qu'afin de maintenir la position panthéiste, nous devons reconnaître des distinctions implicites que le criticisme a rendues explicites; et M. R. lui-même nous a montré comment cela se peut faire.

Relativement aux antinomies du bonheur et du devoir, de l'évolution

et de la création, de l'infini et du fini, je ne veux naturellement pas entreprendre de prouver qu'il n'y a point d'incompatibilité définitive entre les doctrines philosophiques mises en opposition par M. R. Ce que j'ai tâché de montrer, c'est que la différence définitive consiste plutôt dans un renversement de l'ordre des termes, que dans la suppression absolue de l'un des termes opposés. L'évolutioniste philosophe ne nie pas la création en quelque sens que ce soit ; et, de même, le créationiste philosophe ne nie pas l'évolution. M. R., par exemple, encore bien qu'il puisse critiquer des théories scientifiques particulières d'évolution, ne tient pas toute théorie scientifique d'évolution, en tant que telle, pour incompatible avec sa doctrine philosophique de la création. Pareillement, un évolutioniste philosophe peut appliquer le mot *création* à ce qu'il regarde comme le produit, en dernier lieu (*ultimately*), de l'évolution. Par exemple, nous pouvons parler de "créations" artistiques et scientifiques, et ceci en un sens qui n'est point purement métaphorique. Les tentatives de compromis dont parle M. R. sont, je l'accorde, des "théories mixtes" et, comme telles, ne sont pas des réconciliations logiques obtenues entre les deux doctrines philosophiques. Mais ce n'est point à ces théories que je pensais. La "création" dont j'ai parlé, c'est la création par l'esprit humain lui-même, et non point une création analogue à cette dernière. Ce que j'ai dit, ce n'est pas que la création pouvait être conçue par un évolutioniste comme le commencement (*le début*), mais qu'elle pouvait être conçue comme le résultat (*the outcome*) d'un procès universel d'évolution. Ainsi la question n'est pas, laquelle des conceptions doit être supprimée, mais bien de savoir si la conception de l'évolution doit être subordonnée à celle de la création, ou, au contraire, celle-ci à celle-là.

Le changement dans la manière de présenter cette antinomie peut paraître pratiquement sans importance ; mais, en ce qui concerne l'antinomie du bonheur et du devoir, un semblable changement me paraît modifier considérablement la nature de l'opposition. Dans l'idée de M. R., l'alternative est entre une "doctrine du devoir" rationnelle, à laquelle une doctrine du bonheur est subordonnée, et une "doctrine du bonheur" qui peut, théoriquement, ne point reconnaître des droits et des devoirs, mais doit apprécier chaque action simplement par ses conséquences bonnes ou mauvaises, le bien et le mal n'étant point des conceptions fixes. Or, si la doctrine du bonheur peut arriver, par un procédé rationnel, à des droits et devoirs fixes, et c'est ce que certains de ses défenseurs prétendent, elle ne diffère plus de la doctrine de M. R. que par une subordination théorétique des conceptions de droit et de devoir à l'idée d'une fin, et nullement par la suppression de ces conceptions ; de même, précisément, que, d'un autre côté, M. R. ne supprime pas, mais subordonne seulement la notion de bonheur. Une semblable doctrine du bonheur est une doctrine rationnelle, en tant qu'opposée à l'hédonisme empirique de ceux suivant qui toute bonne action procède immédiatement de la pitié ou de la sympathie, quoiqu'elle soit "empirique" d'ailleurs, en tant qu'opposée au rationalisme qui fait du droit et du devoir des conceptions irréductibles. Du bonheur qui est la fin, la liberté au sens négatif, c'est-à-dire l'absence de contrainte est la condition ; mais la liberté au sens positif peut être identifiée avec le bien

le plus élevé. Ainsi comprise, elle garde le rang de "premier principe." La loi interne, suivant cette idée, est obligatoire, non en soi, mais par relation à certaine fin que l'individu a faite sienne. Il y a, de plus, selon M. R., un "commandement" impliqué dans l'"obligation" de la loi interne : à savoir le commandement de la "conscience autonome." Ceci s'accorde bien avec la doctrine du bonheur. D'après celle-ci, en effet, le mot "commandement" ou "obligation," implique, même ici, relation à quelque fin. Ainsi, pour la doctrine du bonheur, la difficulté de faire du commandement un premier principe est entièrement évitée, tandis que la doctrine rationaliste présente cette difficulté, de supposer une conception analogue, au moins partiellement, à celle du commandement externe, et toutefois n'admettant pas de réduction. Car la notion de l'obligation externe est réductible naturellement, et pour l'une comme pour l'autre des deux doctrines, à la fois psychologiquement et rationnellement.

Les remarques de M. R., au sujet de cette antinomie, ainsi d'ailleurs que de celle de l'infini et du fini, soulèvent, comme il le dit lui-même, des problèmes dont nous n'avons pas maintenant à nous occuper. Sur certaines de ces remarques, au surplus, alors même que je ne craindrais pas de trop allonger cette communication, j'aimerais mieux prendre le temps de nouvelles réflexions. Mais, pour ce qui est de l'antinomie éthique, j'ai tenu à bien marquer mon intention, qui n'était pas seulement d'affaiblir les différences, mais de trouver de réelles formules d'accord entre des doctrines qui sont encore, il faut le reconnaître, profondément opposées.

T. WHITTAKER.

SECONDE RÉPONSE.*

C'est tout plaisir, comme on dit, de discuter avec M. Whittaker, tant il apporte de sincérité et d'ouverture d'esprit à l'examen des difficultés des doctrines et à la recherche des vraies différences des points de vue, au lieu de se plaire comme bien d'autres à ces chicanes qui semblent promettre des succès d'amour-propre à un polémiste et n'éclaircissent pas les questions.

Je ne reviendrai donc pas sur des points qui paraissent désormais réglés entre nous :—sur la justification rationnelle d'une division dichotomique des doctrines philosophiques ;—sur la crainte, précédemment exprimée, d'une altération possible de la fonction critique de la philosophie, par l'effet du rôle accordé à la raison pratique dans la décision de certaines questions de théorie ;—sur l'accord où le criticisme se rencontre avec l'une des grandes "religions historiques," quoique sans l'avoir cherché.

Reste "la différence de vue réellement fondamentale." Admettons la dichotomie et l'alternative forcée entre deux ordres de doctrines ; admettons, des deux côtés, le manque de démonstration apodictique, l'impossibilité de l'irréfragable certitude : l'acte du choix doit être déterminé,

* *La Critique Philosophique*, September 30, 1887.

dit M. W., non par les émotions relatives à la pratique, mais par l'espèce d'émotion qui détermina réellement la forme de la doctrine de Spinoza, quoique lui-même ait pu regarder cette doctrine comme forcée pour l'esprit à raison de sa pure évidence. Mais je conteste ici à M. W. le droit de séparer, en cette affaire, l'émotion intellectuelle, la "croyance intellectuelle" qui détermina, je n'en doute point, Spinoza, d'avec la conviction (la conviction fausse) où ce philosophe était de posséder des démonstrations apodictiques de ses propositions et la connaissance rigoureusement adéquate des objets de ses définitions et de ses axiomes. Mais quoi ! M. W. ne convient-il pas lui-même que l'espèce d'émotion à laquelle il demande qu'on se fie, "suppose un idéal intellectuel suggéré par la science ?" Et que devient cet idéal, transporté dans la philosophie, si l'on doit en même temps avouer que la philosophie est intellectuellement incertaine, n'est pas la science ? C'est le propre sujet de l'émotion *sui generis* qui disparaît.

Selon M. W., le système panthéiste, en dehors même de l'illusion de la démonstrativité, offre à l'intellectualiste non dogmatiste un idéal suffisant, et renferme de quoi motiver un choix, une croyance. Cela se peut en fait ; mais ce choix et cette foi ne peuvent plus alors invoquer au nom de la vérité, sous l'empire de l'émotion, de la passion du vrai, un privilège. Considérons les choses comme elles doivent réellement nous apparaître dès que nous renonçons sérieusement à la certitude du pur intellectualisme,—ce que Spinoza était si loin de faire.—La passion de la vérité n'étant plus toute en jeu du même côté, mais demeurant libre, rien n'empêche les autres passions, celles que M. W. désigne comme "relatives à la pratique" et qui sont congénitales de l'organisation psychique de l'homme, les émotions et notions intéressées, sentimentales, individualistes, finalistes, d'intervenir et de réclamer sans aucun détriment pour la raison, leur place et une juste part d'influence dans la solution du problème cosmique et la détermination de la destinée humaine. La croyance qui voudrait être purement intellectuelle est décapitée, quand on la sépare de la croyance à la démonstration pure, et l'idéal panthéiste cesse de pouvoir, de préférence à tout autre idéal, se donner pour intellectuel, du moment que d'autres sont également permis à la contemplation intellectuelle.

En discutant le rapport de la métaphysique à la morale, en proposant de "distinguer clairement entre les deux points de vue, l'éthique et le théorique,"—sans nier ni subordonner aucun des deux,—et, dès lors, "d'éviter d'une part l'affirmation d'une fin morale de l'univers ; de s'abstenir, de l'autre, de toute tentative pour trouver une justification morale de quoi que ce soit dans le simple fait de sa détermination nécessaire suivant des lois universelles," M. W., qui ne refuse pas, d'ailleurs, de constater un désaccord entre l'ordre de la nature selon le panthéisme et l'ordre moral de la conscience, n'entend pas, dit-il, conclure de cette double vue à "un scepticisme limité," à une sorte de "neutralité motivée par un doute sur la nature ultime des choses." Mais il ne suffit pas de dire qu'on n'entend point faire ce qu'on fait implicitement. La neutralité, ou le scepticisme, est au fond et s'impose, s'il y a une désharmonie reconnue et irrémédiable entre la solution qu'on admet du problème cosmique, et le vœu qu'on est disposé à écouter de la morale, sans que l'on voie aucune raison pour

subordonner l'une des indications à l'autre, dans le jugement que l'on porte sur la partie inconnue des choses et sur ce qui *doit être*.

Mais en peut, nous fait observer M. W., soutenir la compatibilité du panthéisme le plus conséquent avec le maintien de la vue éthique en tout ce qui dépend de la volonté humaine ; on peut regarder la loi morale comme étant sans application à l'ensemble des choses, et toutefois obligatoire pour les hommes. J'accorde, en effet, qu'il ne se trouve pas une formelle contradiction logique dans le système qui soumet l'univers et la conscience, les causes et fins des phénomènes naturels et les causes et fins des actes humains intentionnels, à des législations différentes, opposées, mutuellement irréductibles ; mais on conviendra que l'harmonie esthétique et morale de la doctrine, si ce n'est la pure logique, est alors en souffrance. Toute législation d'ordre universel, en tant que d'expérience constante et gouvernant la nature des choses, adresse à notre volonté, spontanément, quelque chose comme l'impératif stoïcien : *Naturam sequere*. Or, dans l'espèce de dualisme proposé, deux préceptes naturels se combattent : ce sont ceux dont Spinoza a choisi l'un pour sa théologie, l'autre pour sa morale. D'autres philosophes opineront pour l'unité de règle et pour le modèle pris exclusivement dans le monde externe ; car on ne voit pas pourquoi la volonté humaine s'obligerait à poursuivre un idéal de sa façon, en se conformant à un modèle interne, alors que la raison statuerait, d'accord avec Spinoza, que la finalité et les passions individuelles, éléments principaux de composition de ce dernier modèle, ont un fondement tout imaginaire et illusoire, et que le modèle externe, au contraire, s'impose à un entendement rendu adéquat à l'éternelle nécessité de l'univers. Si Spinoza lui-même a voulu néanmoins conserver un monde intérieur, un ordre moral, un règne de la liberté (sans préjudice du déterminisme absolu) et s'il a ainsi juxtaposé deux systèmes, c'est qu'il a été, et même à très haut degré, accessible à l'émotion morale. Il croyait sa théorie du grand monde absolument démonstrative ou forcée pour l'intelligence, et, la logique ne s'y opposant pas absolument, pourvu que le libre arbitre demeurât fermement nié, il cédait à ladite émotion en prenant dans le petit monde l'exemplaire de la vie raisonnable. Si donc il avait pensé pouvoir satisfaire à la vérité des choses en renonçant à regarder comme l'ordre profond, entier et définitif de la création cet ordre de l'univers et de Dieu selon sa doctrine, qu'il répudiait comme modèle de vie, il aurait probablement réglé sa croyance une fois soulagée du poids des démonstrations prétendues, de manière à obtenir la parfaite harmonie de son système en supposant un accord profond du grand monde et du petit monde, ou de la loi morale et de la loi suprême de la nature, c'est-à-dire en admettant des postulats.

M. W. remarque que j'ai montré moi-même comment il avait été possible de combiner la position panthéiste avec le point de vue éthique, à l'aide d'une sorte de dualisme tel que celui des stoïciens ou de Spinoza, et grâce à des distinctions que la critique a seulement rendues aujourd'hui plus explicites. Cela est vrai, et c'est encore ce que je viens de reconnaître à l'instant. Mais ces distinctions, qui servent à expliquer la juxtaposition d'une cosmologie panthéiste et d'une éthique à modèle interne, ne suffisent pas pour la justifier. A mesure qu'elles deviennent plus claires, et la

dualité, le contraste plus fortement accusés, l'anomalie, la désharmonie paraissent aussi plus inexcusables, dans un système qui se condamne à concilier l'immuable nécessité des faits éternellement enchaînés dans le monde avec la loi morale et l'obligation des êtres en apparence libres ; la cruelle indifférence de la nature, notre mère et souveraine à tous, avec l'amour et la pitié dans le cœur de ses plus parfaites créatures psychiques ; le principe de la guerre sans fin ni trêve des vivants et l'empire de l'égoïsme, cette condition de la conservation de chaque existence, avec la notion du juste et l'ardeur du dévouement ; enfin la loi du sacrifice des faibles aux forts et des individus au tout, dans l'évolution de l'univers, avec la reconnaissance des droits et l'inviolabilité de la personne, dans l'ordre social qui n'est pourtant qu'un produit et une partie de cette évolution. On a beau dire, il y a quelque chose de forcé et de violent, qui dans certaines combinaisons de doctrines hétérogènes dénote une sorte de contradiction latente. Cette contradiction, on finit toujours par la dégager en se livrant à une étude approfondie de tout système où les dispositions mentales incohérentes d'un philosophe ont dû l'introduire.

D'une façon générale, et touchant plusieurs des oppositions que j'ai formulées pour l'établissement de ma méthode de classification dichotomique, M. W. pense que "la différence définitive consiste plutôt dans un renversement de l'ordre des termes que dans la suppression absolue de l'un des termes opposés," et qu'ainsi il n'y aurait pas l'incompatibilité absolue que je prétends. Je répondrai à cela que, sans doute on peut s'arranger pour présenter les questions de la sorte et construire des systèmes qui, à mon point de vue, sont de nature mixte, mais que, pour moi, j'ai défini les termes des oppositions expressément pour qu'ils fussent contradictoires : et, en fait, on ne me contestera pas que les affirmations et négations les plus tranchées, sur ces points tels que je les ai définis, n'aient joué le plus grand rôle tout le long de l'histoire de la philosophie.

Par exemple, dans le cas dont nous nous occupons tout à l'heure, ce n'est pas, d'une manière vague, entre la thèse de l'homme soumis à la loi morale, et la thèse de l'ordre de l'univers absolument étranger à cette loi, que j'ai établi l'une des oppositions radicales sur lesquelles ma classification est basée ; c'est, d'une manière précise, entre le choix de la notion du devoir et le choix de la recherche du bonheur pour principe unique et propre d'activité morales. Il ne s'agit point de savoir si le bonheur et le devoir sont conciliables, ni même lequel des deux a le pas sur l'autre, selon qu'est la doctrine, mais bien *si le devoir est le principe unique*. Or, à la question ainsi posée des réponses différentes ne peuvent être que logiquement contradictoires, formulées par oui ou par non. La poursuite du bonheur, plus généralement celle du bien sont des faits et des passions, mais ne sont pas la loi morale, et il y a une loi morale : voilà ce que pense celui qui répond par un oui à la question.

En ce qui concerne l'évolution et la création, "l'évolutionniste philosophe ne nie pas, dit M. W., la création en quelque sens que ce soit ; et de même, le créationniste philosophe ne nie pas l'évolution." Peut-être que non, mais l'opposition que j'ai formulée, qui est impossible à lever et qui existe de fait

entre les plus grandes et les plus célèbres doctrines historiques, comptant toutes deux des adhérents sans nombre, cette opposition est entre une affirmation et une négation qui portent sur des points identiques :—pur premier commencement du temps et des phénomènes ; ou éternité du monde phénoménal ;—création dans la pensée, par la volonté d'un créateur *transcendant* ; ou développement spontané, continu, des propriétés d'une substance nécessaire, en laquelle tout ce qui fut, est et sera, est *immanent*. Ce sont bien là des positions contradictoires.

D'après cela, rien ne m'oblige à tenir " toute théorie scientifique d'évolution, en tant que telle, pour incompatible avec ma doctrine philosophique de la création,"—M. W. a parfaitement raison de le constater,—encore bien que je puisse " critiquer des théories scientifiques particulières d'évolution." Cela dépend de savoir si le sens donné à l'idée d'évolution par l'auteur d'une théorie est ou non celui que j'ai pris pour ce mot *évolution* en le définissant en vue de ma classification des systèmes. Les théories que j'ai combattues sont, non pas celles qu'on peut appeler " scientifiques particulières," et je ne m'attribue pas pour les juger la compétence requise, mais bien celles qui ont tort de se dire sérieusement *scientifiques*, car elles sont loin de se renfermer dans les limites des phénomènes évolutifs accessibles à l'expérience ou à des inductions précises d'un genre vérifiable. Or ce sont ces dernières seules qui sont incompatibles avec la doctrine de la création, telle aussi que je l'ai définie et qu'elle est généralement comprise.

M. W. parle, un peu après, d'un sens où " l'évolutioniste philosophe " pourrait à son tour ne pas s'interdire l'idée de création. Ce serait, dit-il, par exemple, en admettant " des *créations* artistiques et scientifiques," et cela non point par simple métaphore. Mais cet évolutioniste philosophe regarderait ces *créations* comme " le produit en dernier lieu de l'évolution." En ce cas, il faudrait, pour juger de la compatibilité ou de l'incompatibilité des notions ainsi associées, en réclamer des déterminations plus précises. J'ai tout lieu de croire que le réel caractère créateur de ces *créations* se trouverait sacrifié, excepté dans les mots, aux exigences de l'idée philosophique de l'évolution universelle.

La pensée propre de M. W. sur ce sujet, c'est que la création " peut être conçue comme le résultat (*the outcome*) d'un procès universel d'évolution." Je n'ai pas, dans ma première réponse, saisi exactement cette pensée. J'avais l'esprit préoccupé de nos polémiques de France touchant l'idée de l'évolution considérée comme la forme de la création du monde par Dieu, et j'ai cru qu'il s'agissait encore ici de cette conciliation prétendue de la théologie et des systèmes de la nature. Mais le mot *outcome*, néologisme anglais, quand il est ainsi pris substantivement, signifie la chose même qui provient et résulte, et non l'acte de début et de commencement de la chose qui se produit. Ce qu'il faut comprendre, c'est donc maintenant, et sauf erreur nouvelle de ma part, que le procès universel d'évolution de la nature est le grand fait, l'éternelle donnée, et que l'ordre de la liberté et de la création est le dernier terme de ce procès, un produit de l'évolution, par conséquent. La création, comme telle, serait exclusivement l'œuvre de l'esprit humain une fois produit, mais le monde lui-même ne procéderait point d'un acte premier, divin, imaginé d'après l'analogie de cette œuvre.

Cette manière de représenter les choses est, on le voit, l'inverse de ce que j'avais cru, l'inverse de la théorie de "l'évolutionisme chrétien," que M. W. paraît, ainsi que je fais, regarder comme insoutenable. Il estime qu'en se plaçant à ce point de vue, la question ne serait plus de savoir laquelle des deux conceptions, évolution ou création, doit être adoptée, laquelle rejetée, mais seulement quelle est celle des deux qui doit être subordonnée à l'autre. Je ne saurais être de cet avis. Les deux conceptions ainsi entendues divergent toujours radicalement et s'opposent sur le point essentiel : l'une affirme l'éternité des phénomènes, et l'autre, l'acte de leur premier commencement ; l'une, la procession du monde parti de l'esprit et de la liberté ; l'autre, la procession de l'esprit et de la liberté émanés de la substance aveugle et fatale.

L' "évolutionisme chrétien" nous présente le total de l'évolution comme l'effet d'un acte de création. L'espèce plus obscure d'évolutionisme que M. W. a en vue nous donne, au contraire, des actes de création pour les résultats du fait de l'évolution, à peu près, sans doute, de la manière que, dans les cosmogonies antiques, on faisait naître les dieux et les hommes, l'esprit et ses œuvres, du chaos et des forces naturelles désignées sous différents noms. C'est là prendre le parfait contre-pied non seulement de la doctrine chrétienne, mais même de la doctrine philosophique de la création à son premier degré, telle qu'elle apparut dans le *voûg* d'Anaxagore et dans le démiurge de Platon. Ce qui semble à M. W. n'être qu'un "changement dans la manière de présenter l'antinomie," un remplacement de l'option forcée entre deux conceptions contradictoires par le choix d'un ordre de subordination à établir en un sens ou dans le sens opposé, entre deux conceptions légitimes, est au contraire une décision bien nette, et même explicite, en faveur du premier principe des réelles doctrines d'évolution anciennes et modernes. Et ce changement, cette option, à vrai dire, comment M. W. s'imagina-t-il qu'elle "peut paraître pratiquement sans importance," alors que, par ses liens logiques avec les autres antinomies : de la substance et de la pensée, de l'infini et du fini, de la nécessité et de la liberté, l'antinomie de la création et de l'évolution, même telle qu'il la comprend, a une portée pratique aussi bien que théorique immense et qui s'étend à tous les problèmes de la spéculation philosophique et des croyances religieuses ?

C'est au changement qu'il propose dans l'exposition de l'antinomie du devoir et du bonheur que M. W. attribue la grande importance pratique. La nature de cette opposition lui paraît pouvoir être considérablement modifiée. Un terrain de conciliation pourrait au moins s'établir, selon lui, en ce que, d'une part, la doctrine du bonheur arriverait chez certains de ses adhérents à corriger son vice d'empirisme, à trouver un procédé rationnel pour déterminer des droits et devoirs fixes relativement à sa fin de bonheur, à poser enfin la liberté au sens positif (qu'il faut distinguer de la simple absence de contrainte) comme le bien le plus élevé à poursuivre, et par conséquent comme un premier principe ;—et c'est ce que veulent les adhérents de la doctrine du devoir ;—et que ceux-ci, de leur côté, ne suppriment pas, mais seulement subordonnent la "notion du bonheur." Ainsi tout le litige des deux doctrines se réduirait à savoir si l'obligation

intimée par la loi morale se rapporte à une certaine fin et lui est subordonnée. Et cela semble au premier abord peu de chose. Mais c'est beaucoup, c'est même tout, pour qui analyse bien les termes de la question ; et comme la question se résout contradictoirement, par le oui ou le non, entre les écoles de morale, l'antinomie que M. W. voudrait affaiblir subsiste en toute sa rigueur formelle.

Je n'examinerai pas ici, car ce serait trop long, s'il est bien vrai que la doctrine du bonheur se puisse détacher de la méthode empirique, et qu'il y ait moyen, sans en appeler à un autre principe de jugement et d'action que le bonheur, de trouver pour celui-là une définition générale indépendante des goûts et attrait particuliers que nous voyons si variables, et qui, leur donnant à la fois satisfaction à tous, permette la déduction de préceptes de conduite fixes et l'établissement de telle chose que des droits et des devoirs. Mais supposons cette merveille obtenue, il est clair que, par là même, une idée générale du bien aura été substituée, en tant que règle, au libre attrait du *bonheur*, ou des plaisirs dont le bonheur se compose, et que cette idée du bien elle-même aura revêtu le caractère d'une *notion* dont on supposera la donnée constante et l'égalité détermination dans tous les esprits. C'est parce qu'il subit l'illusion de cette métamorphose de la doctrine empirique du bonheur, et qu'il se la figure possible tout en n'abandonnant pas le fondement propre de l'hédonisme, c'est pour cela qu'il emploie une expression peu usitée : "la notion du bonheur" ; et "je ne supprime pas, suivant lui, je subordonne seulement la notion de bonheur," dans mes vues de morale, en contre-partie des philosophes hédonistes qui ne supprimeraient pas, qui seulement subordonneraient théoriquement à une fin les conceptions de droit et de devoir. Or, ce simple mot *notion* fait ressortir toute notre dissidence. La morale criticiste n'a pas plus à supprimer qu'à reconnaître une *notion de bonheur* attendu qu'elle n'en connaît aucune. Ce qu'elle connaît et reconnaît c'est la passion naturelle du bonheur, passion légitime sous la loi morale, pur fait, et de la détermination la plus variable, en dehors de cette loi, et duquel aucune loi ne se peut tirer. Je répète que l'opposition qu'il s'agirait de lever garde toute sa force. La morale criticiste nie que l'obligation se puisse déduire du bien et de la fin ; en d'autres termes, que d'un bien et d'une fin, quelles qu'en soient les définitions, on puisse prouver à l'individu que la poursuite lui est obligatoire, s'il n'admet déjà le principe de l'obligation autonome ; et la morale criticiste affirme que, de ce principe une fois admis, suit une détermination du bien moral et de la fin morale, sans qu'ait été fixée préalablement la matière du devoir. Je m'en réfère à Kant : *Fondements de la métaphysique des mœurs*.

Mais M. W. remarque que toute obligation de source externe est, tout le monde en convient, "réductible" et ne saurait passer pour un premier principe ; et, comme la conception du commandement interne est, dit-il, analogue, au moins partiellement, à celle des lois externes, il conclut de là que la première non moins que la seconde, et les mots mêmes *commandement* ou *obligation* "impliquent relation à quelque fin" : d'où une difficulté pour la doctrine rationaliste, qui n'accepte aucune "réduction" pour sa conception du commandement de la conscience autonome ; et une supériorité de certaine doctrine du bonheur qui admettrait l'existence d'une

loi interne obligatoire : obligatoire "non en soi, mais par relation à certaine fin que l'individu a faite sienne." Mais je conteste que ces concepts du devoir et de l'autonomie impliquent une fin, ou du moins une autre fin,—car il y a ici une équivoque possible et qu'il faut lever,—une autre fin que celle d'obéir à ce commandement intérieur, aux dépens même du bonheur. C'est une différence radicale, au lieu de l'analogie que M. W. invoque avec les lois externes. Ce qu'il regarde comme la difficulté de la doctrine criticiste du devoir en est l'idée mère, la grande caractéristique et le triomphe ; et la faiblesse de l'hédonisme est de ne pouvoir imposer cette *certaine fin que l'individu doit faire sienne* ; de ne pouvoir s'élever jusqu'à l'obligation pour aucune des fins et aucun des principes d'action auxquels il tente de conférer des caractères d'universalité et d'impérativité. Ces caractères sont incompatibles avec la nature empirique, individuelle et variable de toutes les déterminations de sentiment et de conduite qui ont leurs racines dans les impressions agréables, quelque extension et quelque élévation que puissent recevoir les idées d'intérêt et de plaisir chez les théoriciens de la doctrine du bonheur.

Les "réelles formules d'accord," cherchées pour la solution de l'antinomie historique des deux grands systèmes d'éthique, sont *plus réellement* des modes d'option timide, et mêlée de quelque regret, en faveur de l'un des deux principes contradictoires. Les deux doctrines sont encore, ainsi que l'avoue en terminant M. W., profondément opposées, et la logique n'autorise pas l'espérance de leur conciliation, non plus que la connaissance du passé ne permet de prévoir la victoire définitive de l'une d'elles dans l'avenir.

C. RENOUVIER.

II.—THE PSYCHOLOGY OF STIMULANTS.

Συμβέβηκε δὲ τοῖς ἀνθρώποις ποιῆσθαι τὰς παιδιὰς τέλος· ἔχει γὰρ ἴσως ἡδονὴν τινα καὶ τὸ τέλος, ἀλλ' οὐ τὴν τυχοῦσαν, ζητοῦντες δὲ ταύτην, λαμβάνουσι ὡς ταύτην ἐκείνην, διὰ τὸ τῷ τέλει τῶν πράξεων ἔχειν ὁμοίωμά τι. τό τε γὰρ τέλος οὐδενὸς τῶν ἰσομένων χάριν αἰρετόν, καὶ αἱ τοιαῦται τῶν ἡδονῶν οὐδενός εἰσι τῶν ἰσομένων ἕνεκεν, ἀλλὰ τῶν γεγονότων, οἷον πόνων καὶ λύπης.—ARISTOTLE.

I.

THE opinions of mankind about the class of substances called "stimulants" and "narcotics" have undergone a series of changes not unlike those that have affected opinions held with regard to many other things of less and of greater importance. These substances, or at least those of them that have been known from the earliest times, such as alcohol in its various forms, were, we may suppose, discovered accidentally, and at first recognised as valuable for their medicinal virtues, and for their powers of soothing pain of mind and exciting joy. Then people arose who imagined that he who first showed men how to make such potent drinks must have been more than human. They, therefore, paid divine honours to the supposed discoverer of wine, and created those Dionysiac myths about which so much has been written. The first worshippers of the god of the grape were the early representatives of all who try to transcend the limits imposed upon human life by necessity, or to extract from it greater pleasures than it is capable of yielding. Let us remark, in passing, that it is they who have had the merit of finding the need for, and consequently inventing, a number of terms, of which the word "intoxication" may serve as an example, that have since been applied to the delights of poetry, and to religious enthusiasm. In later periods certain moralists, seeing what evils these *chercheurs d'infini* sometimes bring on themselves, have made efforts to suppress altogether the agents that give rise to such terrible consequences. And, lastly, science has come to the investigation of intoxicants as of everything else. After claiming the right to make researches into the origin and worth of institutions and religions, the scientific man demands that the pretensions of wine to take its place among the things that minister to human happiness shall be decided by experiments performed in physiological laboratories; and that the enthusiasm of those who in former days made Bacchus a god, and the wrath of the indignant teetotal lecturer, shall be equally set aside as irrelevant.

One phase of this particular movement of science is the discussion of the

effects of alcohol on the human system which is constantly reappearing. And this discussion, carried on chiefly by scientific physicians, and following the various "temperance movements" that within the last half century have made their influence felt in England and America, is in several ways very significant. Besides being an illustration of the law that the scientific investigator comes after the moralist, and of the tendency of science to claim for herself the right to say the last word on every question, it supplies not a few instances of a species of onesidedness sometimes found in men of physical science, which causes them to apply the scientific method incompletely, to look at things too much under the aspect that happens to be the first to draw their attention, and hence to allow their views to be determined by a consideration of only half the facts.

The controversy between the scientific advocates and opponents of teetotalism has been made to turn chiefly on the question whether alcohol is a food or not. The conclusion that has been arrived at by most of the authorities is briefly this: a small but definite quantity of alcohol can be made use of by the organism to keep up the animal heat; if more than this quantity is taken, it merely serves to stimulate the nervous system. From this conclusion the practical rule has been deduced that a man ought never to take in the course of a day more than the number of glasses of wine corresponding to this amount of alcohol. Some indeed go a little further, and are willing to permit that rather more alcohol than the "saturating quantity" shall be taken, on the ground that good wines are agreeable to the cultivated palate. But the question at once occurs to the philosophical reader, why did mankind first begin to drink wine? Was it because they thought it an economical kind of food? Or because they found it pleasant to the taste? It is plain that it could not have been for either of these reasons. The authorities have told us that the greater part of the wine most people drink does not serve for food at all, and they tell us also that man has on the whole been guided rightly in the choice of food by his instinct. And if it is contended that the human race has taken to alcoholic drinks because it found them pleasant to the sense of taste, what is the explanation of the fact that certain nations consume freely various preparations of alcohol which, to the unsophisticated palate, are merely disgusting? And how, again, does it happen that nations that have not been able to procure wine, or that have been forbidden it by their religion, have adopted in its stead opium or some preparation of hemp? For there is no doubt that the taste of these latter substances is extremely offensive.

Nothing but preoccupation with an incomplete view of the subject, and afterwards absorption in the process of establishing the results of experiments suggested by this incomplete view, can have prevented any one from seeing that the reason why men took to stimulants was that they might receive stimulation, and that, therefore, the real question between the advocates and opponents of the general use of wine is whether a certain amount of its stimulating action is on the whole desirable. Now by bringing into definite consciousness the sub-conscious reasoning that has led the higher races of mankind to persist in the use of alcohol, and to regard it as

an essential part of the things that make life tolerable for a civilised being, the empirical practice of the majority of men may be justified ; and here, as in other cases, there is a certain advantage in stating articulately to ourselves the ground of our practice ; for when we have philosophised about our social customs, and found them to be good, a little additional dignity is imparted to them. In this case there is also another and a more convincing argument in favour of taking the trouble to philosophise a little. By so doing we shall arrive at a point of view from which it will be possible to learn what we ought to think of certain exotic drugs, about which curiosity has often been excited. An impartial consideration of the various descriptions of the effects of these drugs will suggest some modifications in the common impression as to their nature.

II.

The whole psychology of the use of stimulants is contained in a passage I am about to quote from an article by De Quincey on "National Temperance Movements." He is speaking of the impulse that occasionally causes persons who have made abuse of the powers of wine or opium, but who, after suffering the usual consequences of intemperance, have been completely restored to health, to renew their acquaintance with their favourite drug. "If the reader will permit me for a moment what without such an apology might seem pedantic, I would call it the instinct of *focalising* which prompts such random desires. Feeling is diffused over the whole surface of the body ; but light is focalised in the eye, sound in the ear. The organisation of a sense or a pleasure seems diluted and imperfect unless it is gathered by some machinery into one focus or local centre. And thus it is that a general state of pleasurable feeling sometimes seems too superficially diffused, and one has a craving to intensify or brighten it by some sufficient stimulant." The "craving" here described is, of course, quite a different thing from the physical craving which is felt by those who are accustomed to the use of any drug. It is not a desire to get rid of a pain, but to experience again the special kind of happiness derived from that concentration of all separate pleasurable feelings which is here compared to the bringing of rays of light to a focus by the lenses of the eye. This sense of happiness sometimes arises spontaneously, but generally it implies as a condition some sort of stimulation ; and the desire for it is, of course, not confined to those who have at some time or other gone to excess in intoxicants.

All that aspect of the fact of stimulation which has suggested the remarks I have quoted above, is ignored both by the scientific advocates of teetotalism, and by those who oppose them merely on the ground that alcohol is capable to a certain extent of serving as food. They confuse the sort of feeling De Quincey describes here with the physical craving produced by long-continued excess, pass it over as something abnormal, and then proceed to discuss the question entirely on physiological grounds. No one will deny that the physiological aspect of the subject is important ; but the phenomena of consciousness have also their claims to recognition. The physiologists, through devoting their attention to digestion and circulation and

secretion, and to the consideration of how much "work" (calculated in "foot-pounds") a normal healthy man does on an average in twenty-four hours, while he remains of the same weight, have at length come to regard the maintaining of his weight at the same level from day to day, and the transformation of the "energy stored up in food" into so much mechanical motion, as ends in themselves. But the whole aim of the individual life cannot be to complete the cycle of changes that constitute life on its physical side, any more than the aim of social life can be to prolong itself under exactly the same forms as before. It may be said that in each of these cases "progress"—that is, increase in organisation—is the end; but this is an evasion. Some meaning must be found for organisation beyond itself; and to say that organisation exists either that it may continue to exist or that we may afterwards have more of it, is not to assign a meaning to it. Is it not clear that the real end of the things we call "life," "organisation," "progress," consists at least partly in the pleasant states of consciousness they render it possible to obtain?

This must not be taken to be an insinuation of Hedonism as a complete rule of life. We are concerned here only with the mass of the actions that make up the daily life of most of us; and with regard to these actions the doctrine that has been suggested is the only one that is not a circuitous way of telling us that we must do the things we are in the habit of doing for the sake of being able to do the same things to-morrow.

Let it, then, be admitted that the feelings of happiness that come to most of us occasionally, are the true expression of the value of the activity of our organism; that the maintenance of the organism in a state of efficiency, or, to use less technical language, the keeping up of our bodily health, is a means and not an end. The question at once suggests itself, when do these feelings of happiness usually occur? And to this the answer is—during our periods of leisure. The background of most lives must be some kind of work, that is, some kind of objective activity, and when this is intense, consciousness is obscured. But in the intervals of work, self-consciousness again appears. If in these intervals we had not some way of giving new forms to the memories of past experiences, and of contemplating them as coloured by our emotional moods, and if we did not sometimes find this process interesting, we should die of *ennui*. But the human organism, especially under the slightly abnormal conditions of civilised life, finds itself too much depressed by long-continued exertion to take full advantage of its periods of leisure; and even supposing these abnormal conditions removed, the nervous system cannot yield its highest effects in the way of rapid thought and vivid emotion, unless it has its activity exalted a little by some stimulant. This is why the desire spoken of by De Quincey makes itself felt. Does it not, then, seem more rational to consider this desire as the natural suggestion of a way of bringing about a sort of rhythm of the functions subservient to objective activity on the one hand, and those subservient to contemplation and enjoyment on the other, than to denounce it as "a morbid craving"? To make life an uninterrupted series of states of consciousness of the highest quality is impossible, but we may at least try to get out of it sometimes the best it can give us.

If this reasoning should seem satisfactory to the reader, he will find that he has been led to a confirmation of the belief of common sense that the use men have made of wine has been, on the whole, a wise one; for, according to the view we have arrived at, they have used it in order to take the greatest advantage of their intervals of leisure, to brighten social intercourse, to bring out their personality more clearly—in short, to intensify consciousness. The effect of wine on the powers of enjoying at once explains and justifies the taste for it. Some, through extraordinary sensibility to stimulants, and some from other causes, have indeed gone to excess in the use of it; but this does not affect the general argument. And we must not be too severe even on those few who, from one age of the world's history to another, have occasionally over-intoxicated themselves. As has been already pointed out, they have, by means of the experiences they have gone through, been enabled to enrich human language; and they have themselves suffered the consequences of their wrong-doing; for they have not observed the rule of temperance, which, like other virtues, lies between the opposite extremes of excess and defect.

III.

Some of the narcotic agents that are less familiar to Europeans have been known to certain Oriental nations as long as wine has been known to the whole civilised world. Among these the most celebrated are opium and hashish, the stimulating powers of which, since the Western and Eastern nations began to be acquainted with each other, have formed the basis of half-mythical accounts of gorgeous visions and delightful reveries. The curiosity of the more imaginative among Europeans has naturally been excited by such accounts, and these drugs have therefore become the subjects of literary treatment as well as of the investigations of physiologists. In this circumstance they differ from more recently discovered drugs to which similar powers have been attributed, such as ether, nitrous oxide, and chloral, which have been described for the most part only in scientific memoirs, and have scarcely as yet become interesting except to chemists and physiologists. It will therefore be best not to speak further of these last, but to confine our attention to opium and hashish.

For taking this course there is another reason besides the smaller amount of interest attaching to drugs discovered in modern times. It might seem at first that their having no vague associations derived from history and legend, and their having never been described with a view to literary effect, but having always "had the fierce light of scientific inquiry beating upon them," would make it easier to learn what is the exact nature of their action; yet the real state of things is quite otherwise. The facts that are given us by physiologists are useless except for the purpose of interpreting the literature of the subject, as will be seen at once when the modes of treatment of the man of science and of the literary artist are contrasted.

Consider first the way in which a physiologist sets to work when he has decided to study the action of some drug. He administers to himself a measured dose of it; then he proceeds to feel his pulse at intervals of five

minutes, and to note down his observations. After he has become incapable of doing this, he makes use of the portion of intelligence that remains to him to arrive at the conclusion that his ideas are confused. On the next day he describes the last effect he was conscious of as "inebriation with phantasms," or something of that kind. It is well understood, of course, that he is all the time shut up alone in his own room. Now, this is evidently a very inadequate mode of treatment; we do not learn from statements of this kind what are the real effects of the drug on consciousness. Contrast with this method that of the literary artist, and see how much more likely we are to get from him the kind of knowledge we want. Probably he is a seeker of "artificial paradises," who, having in some way or other found out the effect of the drug, has given himself up to the pleasures he derives from it, without analysing his consciousness or feeling his pulse. At length, however, it occurs to him that his experiences would make a good subject for a book, and he begins to analyse his memories of them, a procedure which, from the psychological point of view, is much more satisfactory than that of the man of science, who interferes with the development of the mental phenomena he is observing by trying to classify them as they arise. What will be the nature of a book written under such circumstances? Will not the writer, just because he has to work up his experiences into artistic form, and not to give the bare facts, find himself able to convey an accurate impression of the sort of "atmosphere" the drug creates around the person who has taken it, of the sort of modification it produces in his ways of thinking and feeling, as distinguished from the modifications of his particular feelings and thoughts, these last being, of course, redistributed according to the demands of the scheme he has set before himself? But this creation of a peculiar atmosphere through which experiences are looked at, is really the one effect common to all intoxicants; and the fundamental difference between any two intoxicants is expressed by the difference between the atmospheres they create.

The data then for studying chloral, and other intoxicants of modern origin, in a general way, do not yet exist, for these drugs have not yet become the subject of any contributions to literature. In the case of opium and hashish the data do exist, but, if we wish to form an impartial judgment about them, we must interpret them by means of the facts that scientific investigators have supplied, and also, if possible, by a little personal experience of the drugs themselves. These conditions being supposed to have been fulfilled, it may be permitted to me to give an account, which shall be brief and general, but accurate as far as it goes, of the effects of opium and hashish on the mind.

The intoxicating qualities of opium are well known to English readers from De Quincey's *Confessions*. Hashish is scarcely known in England, but has attracted a little attention from time to time in France. Théophile Gautier, who was a member of the celebrated "Club des Hachichins," made use of his own experiences as material for the brilliant description in *Romans et Contes*. Baudelaire, also, has described some of the effects of hashish in *Les Paradis artificiels*. But, notwithstanding these contributions to the literature of the subject, very little is generally known as to the

real effect of these narcotics. Some people, for example, suppose they have no effect except to bring about unconsciousness. Another erroneous impression, which is as widely prevalent as the impression that narcotics have no effect except that of stupefying, is that those who use opium as a luxury are accustomed to take doses of it in order to obtain the vivid dreams to which it gives rise. As a matter of fact, opium and hashish, with those who are susceptible to their influence (which all people are not), do not depress, but intensify consciousness; and, in the case of opium, the dreams are not usually produced at first, but only appear to confirmed opium-eaters, and then only as a secondary phenomenon.

Opium, in those who are capable of stimulation by it, gives rise to a pleasurable state of feeling something like that which is produced by wine in not excessive doses; but the excitement derived from it, instead of tending to some highest point, remains stationary for hours, and in place of the slight incoherence of thought always present in those who are exhilarated with wine, the most perfect harmony is established among all the conceptions. There is an extraordinary stimulation of the pure intellect, and not merely of the powers of expression. The opium-eater seems to have had the eyes of his spirit opened, to have acquired a gift of insight into things that to mere mortals are inexplicable. The most remote parts of consciousness come into clear light; the finer shades of personality, those that had been unknown even to the opium-eater himself, are brought into view and become distinct; the smallest details of the things around take new significance, and are seen to be profoundly important; their analogies with other phenomena of nature are revealed. It is the same with the moral as with the intellectual being; that also becomes indefinitely exalted. An absolute balance of the faculties seems to have been attained. The whole man is what in his ordinary state he only tends to be; he has realised the highest perfection of which he is capable; only his "best self" now remains; his lower self has been left behind without need of the purgatorial fire of contention with the environment to destroy it.

To the seeker of artificial paradises, hashish is on the whole less satisfactory than opium. It is indeed unsurpassable in its legendary associations. But, although hashish derives from Eastern legends an air of mystery and attraction, it has been found actually not to be equal as a producer of pleasure either to wine or opium. For the visions of the hashish-eater depend entirely on his immediate surroundings and take their colouring from his state of mind.

The intoxication of hashish generally runs its course in some such way as this. First, there is a sense of gladness accompanied by a tendency to extravagant and causeless laughter. Then, after an interval, during which there are sometimes slightly unpleasant muscular sensations as if produced by the passing of electric currents under the skin, the state called by Gautier "*Fantasia*" begins. By exaggeration and multiplication of the impressions derived from external objects, the most curious hallucinations are produced; space assumes monstrous proportions, and time seems indefinitely extended, as in De Quincey's opium dreams. After the "*Fantasia*," and sometimes mixed with it, that feeling of perfect happiness called by the Orientals

"Kief," a feeling which is also produced by opium, takes possession of the hashish-eater; but this state of mind may, by the rising of some casual association, be reversed, and, as it has been expressed, turn to nightmare.

It ought to have been mentioned that hashish is a preparation made by the Arabians from the leaves of hemp. Several other preparations of hemp have been used as intoxicants; one of these, called *bang*, is well known to the inhabitants of India. There is in the Pharmacopœia an extract of *Cannabis indica*, which is administered in the form of pills. Slight differences manifest themselves in the effects, according as hashish (using this as a general term) is taken in one or other of these forms; but the influence of temperament is probably more important than specialities in the form of the drug. The ordinary extract of *Cannabis indica* has been known to give rise to a sort of reverie having something in common with Gautier's "Fantasia." The imagination is stimulated, but the power of continuous thought disappears. Strange figures may easily be created out of patches of light and shade. A feeling of isolation in the midst of infinity develops itself, and the sense of the vastness of space and time is deepened. A dream-like feeling of happiness spreads itself, "like an atmosphere of light," over the whole being. But the action of the drug in any of its forms is capricious; it becomes intense, then after a time passes away, and when it seems to have finally disappeared returns again.

IV.

No doubt the reader finds that many things have been omitted from the last section which might have been expected to have place in it. "Why has the terrible morrow that follows indulgence in opium or hashish not been described? Why has it not been shown how a craving arises for a renewal of the dose, which the victim at length becomes incapable of resisting? And why has nothing been said about the frightful consequences that follow long-continued abuse of these deadly drugs?" Now this is really equivalent to asking why, in discussing the uses of wine, I have not given a detailed account of an attack of delirium tremens, and gone into a disquisition on the pathology of chronic alcoholism. The terrible visions that are seen by the confirmed opium- or hashish-eater, are really no more a necessary consequence of the use of hashish or opium than the morbid phenomena just referred to are a necessary consequence of the use of alcoholic liquors. The tendency for a physical "crave" to establish itself is not more marked in their case than it is in the case of wine or spirits. And as to the reaction of "the day after," it does not exist either in the case of opium or of the various preparations of Indian hemp. Opium causes headache in those who are incapable of experiencing its "intoxicating"—or, more strictly, its exalting—effects; but with those who are susceptible of its influences there is no reaction whatever. It does not derange the intellectual faculties. Nor does it give rise to a tendency in external things, which is, I am told, occasionally one of the effects of wine, to mix the images of themselves in various and sometimes puzzling combinations.

Wine, opium, and hashish resemble one another in this, that they all afford a means of increasing the pleasurable activity of the nervous system in our intervals of leisure; they all have the power of exaggerating our personality, of making our consciousness more brilliant. And it is for this reason in every case that nations have taken to the use of such substances, each nation growing accustomed to that which it found nearest to its hand or most congenial to its temperament. Why, then, should the exotic stimulants be regarded as objects of mysterious dread? Does it seem quite clear that all the advantages are on the side of that particular stimulant with which we happen to be most familiar? Let it be admitted that it is as bad to take frequent doses of opium, for example, as to over-saturate the system with alcohol every day; may it not be that, as De Quincey contended, a moderate use of opium is not absolutely impossible?

In order that an impartial answer to questions of this kind may be arrived at, it will be well just to pass in review some of the qualifying considerations that must be kept in mind by a student of this subject who has for his aim to arrive at the unadorned truth. We have seen that it is in the literature of the subject that such a student finds the greater part of his materials; but it must be remembered that the aim of this literature itself is not the discovery or the exposition of truth; it is the production of artistic effect. And the artistic method of dealing with Oriental drugs, as with everything else, demands that the lights shall be made brighter, and the shadows deepened. Hence De Quincey, after invoking opium as the bearer of the keys of Paradise, must balance this invocation with a chapter on the "Pains of Opium," in which all the imagery of the "ancient, monumental, cruel, and elaborate religions" of the East contributes to the production of an effect of horror and of mystery; and Baudelaire finds it necessary to place as a dark background to the divine delights of hashish, a moral doctrine according to which every attempt to transcend the normal conditions of human life—to reach "Kief" artificially—is a sin against the nature of things, and implies a diminution of the power of the will, which, becoming more and more rapid, must at length bring to nothingness the victim of the "Satanic" desire to escape from the domain of law. Art finds its materials in life, but it must select from them; it must redistribute the colours it finds in nature, so as to obtain an effect superior to the things themselves. As our purpose is to know what is the exact truth about the drugs we have been speaking of, we must allow for that systematic exaggeration of joys and pains which the artistic mode of treatment renders necessary.

After weighing these considerations, the conclusion that suggests itself is something like this: Hashish and opium are probably not more potent than wine, and for the majority even of those who are susceptible to them, their fascination is less than that of wine. The effects of these three stimulants are different in quality, but not in intensity; speaking in a vague and general way, it may be said that wine stimulates chiefly the power of expression, opium the intellect, and hashish the imagination. Why, then, should not these last also be used as a means of economising capacities of enjoyment?

The idea has sometimes come to me that some of these drugs might be made instruments of psychological research. De Quincey's opium expe-

riences have been used as an argument against the Kantian doctrine that space and time are "*a priori* forms"; for how, it is asked, can *a priori* forms become amplified and extended, as De Quincey says time and space were in his visions? Perhaps the interrogation of consciousness under opium might throw light on the remoter phenomena of association of ideas. If there is anything in this suggestion, opium might become to the psychologist a sort of microscope. The consciousness of the subject— as distinguished from the object-world is said to disappear sometimes under the influence of hashish. How does this affect the various theories about the *ego* and the *non-ego*?

When these drugs have been found useful to psychologists, when they have become in the true sense of the term "philosophical instruments," we may expect to learn in an indirect way what is the worth of the suggestions put forth as to the desirableness of assigning to them a place beside wine as medicines for the mind, as dispellers of gloom. Knowledge such as this will not be the least important part of the "hedonical calculus" which philosophers have proposed to elaborate.

This, however, like the rest, is a mere suggestion. The object of this paper is to bring before the reader the grounds for thinking that the present matter is one in regard to which the common habit prevails of fearing the unknown, of alternately treating it as divine and as diabolical. The exotic drugs of which we have been speaking have, because of their association with the East and the exaggerations they have formed the subject of, attracted the attention chiefly of enthusiasts. When the enthusiasts have been at the same time artists, as in De Quincey's case, the result has been that new literary effects have been produced which are as much superior to the phenomena of opium dreams as these are to the events of ordinary life. It is no wonder, then, that the popular notion about opium should be such as we know it to be. But, if opium were ever to become familiar, does it not seem probable, from what has been said, that we should come to look upon it neither as "a panacea, a *φάρμακον νηπιενθές* for all human woes," nor as "a substance created by the devil to destroy our bodies and souls"; but simply as something which contributes to make human life more agreeably various, and which may perhaps be considered as producing a balance of good, since in itself all variety is good?

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